INDEX OF AUTHORS, 1940.

A.

Acharya, *B. G.*, **Shah**, *R. C.*, and **Wheeler**, *T. S.*, chalkones: reactions of *o*-hydroxyphenyl 6-methoxy-2:3-benzostyryl ketone and of some derivatives, 817.

Adler, *S.*, **Haskelberg**, *L.*, and **Bergmann**, *F.*, synthesis of lipophilic chemotherapeuticals. Part II. 4-Alkylaminoazobenzene-4′-arsonic acids, 576.

Ahmad, *A.*, and **Farmer**, *E. H.*, mechanism of polymerisation. Part V. Dimerisation of unconjugated pentadiene, 1176.

Aldersley, *J. B.*, **Burkhardt**, *G. N.*, **Gillam**, *A. E.*, and **Hindley**, *N. C.*, synthesis of compounds related to antirachitic vitamins. Part II., 10.

Anderson, *W.* See **Campbell**, *N.*

Anslow, *W. K.*, **Breen**, *J.*, and **Raistrick**, *H.*, 1:3:8-trihydroxyanthraquinone, 427.

Argument, *C.* See **Gibby**, *C. W.*

Armstrong, *H. E.*, obituary notice of, 1418.

Aston, *F. W.*, **Bohr**, *N.*, **Hahn**, *O.*, **Harkins**, *W. D.*, **Joliot**, *F.*, **Mulliken**, *R. S.*, and **Oliphant**, *M. L.*, fifth report of the Committee on Atoms of the International Union of Chemistry, 1416.

B.

Bacon, *J. S. D.*, **Bell**, *D. J.*, and **Lorber**, *J.*, use of the benzyl radical in syntheses of methylated sugars. Part II. 4:6-Dimethyl galactose, 1147.

Badger, *G. M.*, and **Cook**, *J. W.*, synthesis of growth-inhibitory polycyclic compounds. Part II., 409.

Badger, *G. M.*, **Cook**, *J. W.*, and **Goulden**, *F.*, polycyclic aromatic hydrocarbons. Part XXI., 16.

Baird, *D. H.*, obituary notice of, 562.

Baker, *J. W.*, syntheses of the indole series. Part I. Synthesis of indolyl-3-glyoxylic acid and of *r*-3-indolylglycine, 458.

Baker, *J. W.*, **Davies**, *W. C.*, and **Hemming**, (*Miss*) *M. L.*, mechanism of aromatic side-chain reactions, with reference to polar effects of substituents. Part X. Depolarisation potentials of *p*-substituted benzaldehydes in acid, neutral, and alkaline media at the dropping-mercury cathode, 692.

Baker, *W.*, and **Besly**, *D. M.*, condensation products of phenols and ketones. Part V. Structure of the dimeric forms of *o-iso*propenylphenols, 1103.

Baker, *W.*, and **Enderby**, *J.*, structure of metanethole, 1094.

Baker, *W.*, and **Munk**, (*Miss*) *I.*, derivatives of 1:2:3:4-tetrahydroxybenzene. Part VI. Oxidation of quinol with sodium chlorate, 1092.

Baker, *W.*, and **Simmonds**, *W. H. C.*, derivatives of 5:6:4′- and 5:8:4′-trihydroxyflavones, and the structure of ginkgetin, 1370.

Balfe, *M. P.*, and **Kenyon**, *J.*, decomposition of chlorosulphinic esters, 463.

Bardhan, *J. C.*, studies in the sterol–œstrone group. Part II. Derivatives of 2-phenyl*cyclo*hexanone, 848.

Barker, *R. L.*, and **Clemo**, *G. R.*, action of selenium at high temperatures on *gem*-methylethyl groups, 1277.

Barnett, (*Miss*) *J.*, **Heilbron**, *I. M.*, **Jones**, *E. R. H.*, and **Verrill**, *K. J.*, studies in the sterol group. Part XLI. A new epimerisation process, 1390.

Barrett, *P. A.*, **Linstead**, *R. P.*, **Leavitt**, *J. J.*, and **Rowe**, *G. A.*, phthalocyanines and related compounds. Part XVIII. Intermediates for preparation of tetrabenzporphins; Thorpe reaction with phthalonitrile, 1076.

Barrett, *P. A.*, **Linstead**, *R. P.*, **Rundall**, *F. G.*, and **Tuey**, *G. A. P.*, phthalocyanines and related compounds. Part XIX. Tetrabenzporphin, tetrabenzmonazaporphin, and their metallic derivatives, 1079.

Bartlett, *R. G.* See **McClelland**, *E. W.*

Bassett, *H.* See **Jorissen**, *W. P.*

Bateman, *L. C.*, **Church**, *M. G.*, **Hughes**, *E. D.*, **Ingold**, *C. K.*, and **Taher**, *N. A.*, mechanism of substitution at a saturated carbon atom. Part XXIII. Kinetic demonstration of the unimolecular solvolysis of alkyl halides, 979.

Bateman, *L. C.*, **Cooper**, *K. A.*, and **Hughes**, *E. D.*, mechanism of substitution at a saturated carbon atom. Part XI. Hydrolysis of *tert.*-butyl bromide in acidic moist acetone, 913.

Bateman, *L. C.*, **Cooper**, *K. A.*, **Hughes**, *E. D.*, and **Ingold**, *C. K.*, mechanism of substitution at a saturated carbon atom. Part XIII. Mechanisms operative in the hydrolysis of methyl, ethyl, *iso*propyl, and *tert.*-butyl bromides in aqueous solutions, 925.

Bateman, *L. C.*, and **Hughes**, *E. D.*, mechanism of substitution at a saturated carbon atom. Part XIV. Unimolecular substitutions of *tert.*-butyl chloride with water, and with anions, as substituting agents in formic acid solution. Part XV. Unimolecular and bimolecular substitutions of *n*-butyl bromide with water, and with anions, as substituting agents in formic acid solution. Part XVI. Hydrolysis of methyl, ethyl, *iso*propyl, and *tert.*-butyl bromides in acidic solutions under conditions believed to be conducive to uniformity of mechanism, 935, 940, 945.

Bateman, *L. C.*, **Hughes**, *E. D.*, and **Ingold**, *C. K.*, mechanism of substitution at a saturated carbon atom. Part XIX. A kinetic demonstration of the unimolecular solvolysis of alkyl halides; kinetics of, and salt effects in, hydrolysis of *tert.*-butyl bromide in aqueous acetone. Part XXII. A kinetic demonstration of the unimolecular solvolysis of alkyl halides; kinetics of, and salt effects in, hydrolysis of *pp′*-dimethylbenzhydryl chloride in aqueous acetone. Part XXIV. Qualitative survey of nucleophilic substitutions of benzhydryl halides in sulphur dioxide solution. Part XXV. Unimolecular halogen exchange between an alkyl halide and halide ions in sulphur dioxide solution, 960, 974, 1011, 1017.

Baughan, *E. C.*, heat of hydration of the proton, 1403.

Baxter, *G. P.*, **Guichard**, *M.*, **Hönigschmid**, *O.*, and **Whytlaw-Gray**, *R.*, tenth report of the Committee on Atomic Weights of the International Union of Chemistry, 475.

Bayliss, *W. H.*, obituary notice of, 1031.

Beech, *W. F.*, and **Drew**, *H. D. K.*, structure of aluminium lakes of azo-dyes and of alizarin, 603.
copper lakes of azo-dyes, 608.
Belcher, *R.*, and **Wheeler**, *R. V.*, studies in composition of coal: extraction of coal with quinoline, 866.
Bell, *D. J.*, determination of the relationship between refractive index and specific rotation in mixtures of 2:3:4:6-tetramethyl α- and β-methyl-*d*-galactosides, 1543.
Bell, *D. J.*, and **Lorber**, *J.*, use of the benzyl radical in syntheses of methylated sugars. Part I. 4:6-Dimethyl glucose, 453.
Bell, *D. J.* See also **Bacon**, *J. S. D.*
Bell, *H. E.*, and **Driver**, *J. E.*, Fries rearrangement of phenyl laurate and phenyl stearate, 835.
Bell, *J.*, salt hydrates and deuterates. Part II. Correlation of heats of dissociation and structure, 72.
Bell, *R. P.*, and **Sherred**, *J. A.*, acid catalysis in non-aqueous solvents. Part IX. The mutarotation of α-nitrocamphor in chlorobenzene solution, 1202.
Bell, *R. P.*, **Sturrock**, *J. G. R.*, and **Whitehead**, *R. L. St. D.*, kinetics of reaction between ethylene glycol and lead tetra-acetate, 82.
Bennett, *D. J.*, **Ramage**, *G. R.*, and **Simonsen**, *J. L.*, resolution of *dl*-Δ^2-*cyclo*geranic acid, 418.
Bergmann, *F.* See **Adler**, *S.*
Berthoud, *A.*, obituary notice of, 1439.
Besly, *D. M.* See **Baker**, *W.*
Bilham, *P.*, and **Kon**, *G. A. R.*, sapogenins. Part X. The carbon skeleton and position of the second hydroxyl group of quillaic acid, 1469.
Blount, *B. K.*, **Openshaw**, *H. T.*, and **Todd**, *A. R.*, *Erythrophleum* alkaloids. Part I. Erythrophleine, 286.
Bohr, *N.* See **Aston**, *F. W.*
Booker, *H.*, **Evans**, *L. K.*, and **Gillam**, *A. E.*, effect of molecular environment on absorption spectra of organic compounds in solution. Part I. Conjugated dienes, 1453.
Bowden, *S. T.*, free radicals and radical stability. Part IX. Influence of short-lived and long-lived radicals on reactivity of alcohols, 880.
Bowden, *S. T.*, and **Clarke**, *D. L.*, free radicals and radical stability. Part X. Influence of the methyl group on stability of triphenylmethyl, 883.
Bowden, *S. T.*, **Clarke**, *D. L.*, and **Harris**, *W. E.*, free radicals and radical stability. Part VIII. Stability of formates and reduction of triarylcarbinols, 874.
Bowden, *S. T.*, and **John**, *T.*, free radicals and radical stability. Part VII. Influence of the phenoxyl group on stability of ketylic derivatives; preparation of carbon monoxide from carbonates, 213.
Bowden, *S. T.*, and **Thomas**, *T. L.*, free radicals and radical stability. Part XI. Methyltriphenylmethyls, 1242.
Bowden, *S. T.*, and **Watkins**, *T. F.*, free radicals and radical stability. Part XII. Fluorotriphenylmethyl and reactivity of halogen substituents in free radicals, 1249.
action of formic acid on triphenylmethyl ethyl ether and on triphenylmethyl chloride, 1333.
Bowden, *S. T.* See also **Clarke**, *D. L.*, and **John**, *T.*
Brandon, *T. W.* See **German**, *W. L.*
Brandt, *C. W.*, and **Neubauer**, *L. G.*, miro resin. Part II. Resin acids, 683.
Breen, *J.* See **Anslow**, *W. K.*
Breuer, *G.*, and **Schnitzer**, *J.*, absorption spectra of *N*-substituted auramine dyes, 461.
Briscoe, *H. V. A.* See **Sebba**, *F.*, and **Winter**, *E. R. S.*
Britton, *H. T. S.*, and **Königstein**, (*Miss*) *M.*, potentiometric estimation of hydroxylamine and hydrazine in alkaline solution, 673.
Britton, *H. T. S.*, and **Welford**, *G.*, electrometric studies of the precipitation of hydroxides. Part XV. Amphoteric nature of vanadium tetroxide. Part XVI. Vanadous hydroxide; nature of vanadous chloride and sulphate solutions, 758, 761.
physiochemical studies of complex acids. Part XIV. Vanadic acid. Part XV. Basic nature of vanadium pentoxide, 764, 895.
Brown, *C. J.*, and **Cox**, *E. G.*, crystal structure of potassium sulphamate, 3.
Brown, *H. F.*, and **Cranston**, *J. A.*, hydrolysis of salts in solution, 578.
Buchanan, *C.* See **Patterson**, *T. S.*
Burgess, *W. T.*, obituary notice of, 100.
Burkhardt, *G. N.* See **Aldersley**, *J. B.*
Burnop, *V. C. E.*, **Elliott**, *G. H.*, and **Linstead**, *R. P.*, fused carbon rings. Part XIX. Experiments on synthesis of tetracyclic compounds of the sexual hormone type, 727.
Burnop, *V. C. E.*, and **Linstead**, *R. P.*, fused carbon rings. Part XVIII. Model substances of the sexual hormone type, 720.
Butterworth, *E. C.*, **Heilbron**, *I. M.*, and **Hey**, *D. H.*, arylpyridines. Part II. Substituted phenylpyridines, 355.
Butterworth, *E. C.*, and **Hey**, *D. H.*, nuclear alkylation of aromatic bases. Part IV. Action of *n*-dodecyl alcohol on hydrochlorides of α- and β-naphthylamine, 388.

C.

Calder, *W. A. S.*, obituary notice of, 563.
Campbell, *N.*, **Anderson**, *W.*, and **Gilmore**, *J.*, structure of aromatic compounds. Part II. Part III. Action of acetyl chloride on α- and β-naphthyl-methylmagnesium halides, 446, 819.
Carcamo, *V.* See **Deulofeu**, *V.*
Carlton, *M.* See **Winter**, *E. R. S.*
Carothers, *W. H.*, obituary notice of, 100.
Carroll, *M. F.*, addition of αβ-unsaturated alcohols to the active methylene group. Part I. Action of ethyl acetoacetate on linalool and geraniol. Part II. Action of ethyl acetoacetate on cinnamyl alcohol and phenylvinylcarbinol, 704, 1266.
Carter, *F. D.*, **Simonsen**, *J. L.*, and **Williams**, *H. O.*, constituents of Indian essential oils. Part XXVII. Synthesis of *dl*-α-curcumene, 451.
Chakrabarty, *N. K.*, and **Mitra**, *S. K.*, preparation of thiophen derivatives. Part II., 1385.
Challenger, *F.*, and **Gibson**, *G. M.*, substitution products of thiopheno-2′:3′-3:2-thiophen, 305.
Challenger, *F.* See also **Files**, *J. R.*
Chambers, *H. H.*, and **King**, *A.*, discontinuities in adsorption processes, 156.
Chatt, *J.*, and **Mann**, *F. G.*, stereochemistry of 3-covalent arsenic; isomeric forms of 5:10-di-*p*-tolyl-5:10-dihydroarsanthren, 1184.
tetra-aryl phosphonium, arsonium, and stibonium salts. Part I. New method of preparation, 1192.
Cheesman, *G. H.*, **Duncan**, *D. R.*, and **Harris**, *I. W. H.*, sodium polyiodides, 837.
Church, *M. G.*, and **Hughes**, *E. D.*, mechanism of substitution at a saturated carbon atom. Part XII. Hydrolysis of benzhydryl chloride in acidic moist acetone, 920.

Church, *M. G.*, **Hughes**, *E. D.*, and **Ingold**, *C. K.*, mechanism of substitution at a saturated carbon atom. Part XX. Kinetic demonstration of the unimolecular solvolysis of alkyl halides; kinetics of, and salt effects in, hydrolysis of benzhydryl halides in aqueous acetone, 966.

Church, *M. G.*, **Hughes**, *E. D.*, **Ingold**, *C. K.*, and **Taher**, *N. A.*, mechanism of substitution at a saturated carbon atom. Part XXI. Kinetic demonstration of the unimolecular solvolysis of alkyl halides; kinetics of, and salt effects in, hydrolysis of *p*-monoalkylbenzhydryl halides in aqueous acetone, 971.

Church, *M. G.* See also **Bateman**, *L. C.*

Clarke, *D. L.*, and **Bowden**, *S. T.*, *p*-phenoxytriphenylmethane and the corresponding free radical, 1334.

Clarke, *D. L.* See also **Bowden**, *S. T.*

Clemo, *G. R.* See **Barker**, *R. L.*

Coats, *R. R.*, and **Gibson**, *D. T.*, reversibility of the rearrangement of *o*-hydroxy-sulphones, 442.

Cobb, *J. W.* See **Muller**, *S.*

Cocker, *W.*, preparation of *dl*-asparagine and *dl*-aspartic acid, 1489.

preparation of derivatives of sulphanilamide, 1574.

Cocker, *W.*, and **Harris**, *J. O.*, preparation of some alkylamino-acids and their electrometric titration, 1290.

Cocker, *W.*, and **Turner**, *D. G.*, condensation products of *m*-dialkylaminobenzaldehydes with compounds containing reactive methylene groups, 57.

Cohen, *A.*, **Cook**, *J. W.*, and **Roe**, (*Miss*) *E. M. F.*, colchicine and related compounds. Part I. Structure of colchicine, 194.

Collyer, *T. A.*, and **Kenyon**, *J.*, resolution of β-naphthylmethylcarbinol, 676.

Conti, (*Prince*) *G.*, obituary notice of, 563.

Cook, *J. W.*, and **Engel**, *L. L.*, colchicine and related compounds. Part II. Synthesis of a simple analogue of *N*-acetylcolchinol methyl ether, 198.

Cook, *J. W.*, and **Martin**, *R. H.*, polycyclic aromatic hydrocarbons. Part XXIV., 1125.

Cook, *J. W.*, and **Robinson**, (*Mrs.*) *A. M.*, polycyclic aromatic hydrocarbons. Part XXIII., 303.

Cook, *J. W.* See also **Badger**, *G. M.*, and **Cohen**, *A.*

Cooke, *R. G.*, **Macbeth**, *A. K.*, and **Swanson**, *T. B.*, carbonyl constituents of eucalyptus oils. Part III. Constitution of phellandral; *d*-, *l*-, and *dl*(synthetic)-phellandric acids, 808.

Coombs, *E.*, and **Evans**, *D. P.*, condensations of carbonyl compounds; kinetic study of the reaction of acetophenone with benzaldehyde, 1295.

Cooper, *K. A.* See **Bateman**, *L. C.*

Copp, *F. C.*, and **Simonsen**, *J. L.*, experiments on synthesis of 1:2-dimethyl*cyclo*hexylacetic acid, 415.

Cornforth, *J. W.*, and **Earl**, *J. C.*, sarcostin. Part I. Preliminary study of its behaviour with reagents, 1443.

Cowan, *D. M.*, **Jeffery**, *G. H.*, and **Vogel**, *A. I.*, physical properties and chemical constitution. Part V. Alkyl ketones, 171.

Cowan, *D. M.*, and **Vogel**, *A. I.*, physical properties and chemical constitution. Part VI. Saturated and unsaturated cyano-esters, 1528.

Cowper, *R. M.*, and **Stevens**, *T. S.*, mechanism of the reaction between arylamines and benzoins, 347.

Cox, *E. G.* See **Brown**, *C. J.*

Cranston, *J. A.* See **Brown**, *H. F.*

Craven, *R.*, obituary notice of, 102.

Criper, *W. R.*, obituary notice of, 103.

Cross, *L. C.*, **Eliot**, *C. G.*, **Heilbron**, *I. M.*, and **Jones**, *E. R. H.*, constituents of higher fungi. Part I. Triterpene acids of *Polyporus betulinus*, Fr., 632.

Cross, *L. C.*, and **Jones**, *E. R. H.*, constituents of higher fungi. Part II. Unsaturated system of polyporenic acid A, 1491.

Crowley, *G. P.*, **Milton**, *G. J. G.*, **Reade**, *T. H.*, and **Todd**, *W. M.*, action of nitrous acid on tertiary amines; influence of acidity, 1286.

D.

Damiens, *A.* See **Jorissen**, *W. P.*

Danby, *C. J.*, and **Hinshelwood**, *C. N.*, sensitisation of the hydrogen–oxygen reaction by nitrous oxide, 464.

Davies, *C. W.* See **Philpot**, (*Miss*) *J. P.*, and **Topp**, *N. E.*

Davies, *G.*, and **Evans**, *D. P.*, influence of alkyl groups upon reaction velocities in solution. Part IV. Alkaline and acid hydrolyses of ethyl esters of lower saturated aliphatic acids in aqueous acetone, 339.

Davies, *W. C.* See **Baker**, *J. W.*

Dawson, *H. M.*, obituary notice of, 564.

Day, *F. H.*, nitration of the 13-halogenobenzanthrones, 1474.

De Langhe, *J.* See **Deulofeu**, *V.*

Deulofeu, *V.*, **De Langhe**, *J.*, **Labriola**, *R.*, and **Carcamo**, *V.*, studies on Argentine plants. Part II. Aspidospermine from *Vallesia glabra* and *Vallesia dichotoma*, 1051.

Drew, *H. D. K.*, and **Dunton**, *F. G.*, quadrivalent vanadium lakes of azo-dyes, 1064.

Drew, *H. D. K.* See also **Beech**, *W. F.*

Driver, *J. E.* See **Bell**, *H. E.*

Duncan, *D. R.* See **Cheesman**, *G. H.*

Dunton, *F. G.* See **Drew**, *H. D. K.*

Dyson, *G. M.*, and **Harrington**, *T.*, action of chlorine on aryl thiocarbimides and the reactions of aryl *iso*cyanodichlorides, 191.

E.

Earl, *J. C.* See **Cornforth**, *J. W.*

Elias, *P. G.*, **Hartshorne**, *N. H.*, and **James**, *J. E. D.*, studies in polymorphism. Part V. Linear rate of transformation of monoclinic into rhombic sulphur, 588.

Eliot, *C. G.* See **Cross**, *L. C.*

Elkins, (*Miss*) *M.*, and **Hunter**, *L.*, azo-group as a chelating group. Part IV. Constitution of the arylazo-bis-oximes, 653.

Elks, *J.*, **Haworth**, *J. W.*, and **Hey**, *D. H.*, union of aryl nuclei. Part V. Modification of the Gomberg reaction, 1284.

Elliott, *D. F.*, **Kon**, *G. A. R.*, and **Soper**, *H. R.*, sapogenins. Part VII. Structure of quillaic acid and its relation to echinocystic acid, 612.

Elliott, *G. H.*, and **Speakman**, *J. B.*, reaction between dibenzyl disulphide and sulphuryl chloride, 641.

Elliott, *G. H.* See also **Burnop**, *V. C. E.*

Enderby, *J.* See **Baker**, *W.*

Engel, *L. L.* See **Cook**, *J. W.*

Evans, *D. P.* See **Coombs**, *E.*, and **Davies**, *G.*

Evans, *L. K.* See **Booker**, *H.*

Evans, *R. C.*, **Mann**, *F. G.*, **Peiser**, *H. S.*, and **Purdie**, *D.*, constitution of complex metallic salts. Part XI. Structure of tertiary phosphine and arsine derivatives of cadmium and mercuric halides, 1209.

Everett, *J. L.*, and **Hewett**, *C. L.*, polycyclic aromatic hydrocarbons. Part XXV. 1- and 2-Alkyl derivatives of 3:4-benzphenanthrene, 1159.

Ewen, *E. S.*, and **Spring**, *F. S.*, triterpene resinols and related acids. Part IX. Oxidation of α-amyradienyl acetate, 1196.

F.

Fahim, *H. A.* See **Schönberg,** *A.*

Farmer, *E. H.*, and **Martin,** *J. F.*, mechanism of polymerisation. Part IV. Experiments relating to constitution of the solid dimeride and the liquid trimeride of $\beta\gamma$-dimethylbutadiene, and to separation of the higher polymerides, 1169.

Farmer, *E. H.*, and **Morrison-Jones,** *C. R.*, mechanism of polymerisation. Part VI. Heat polymerisation of methyl sorbate, and constitution of the dimeric products, 1339.

Farmer, *E. H.* See also **Ahmad,** *A.*

Fichter, *F.* See **Jorissen,** *W. P.*

Files, *J. R.*, and **Challenger,** *F.*, mercuration of simple derivatives of γ-pyrone, 663.

Foord, *S. G.*, thermal polymerisation of styrene and its inhibition, 48.

Foster, *C. K.* See **Hodgson,** *H. H.*

France, *H.*, **Heilbron,** *I. M.*, and **Hey,** *D. H.*, nitrosoacylarylamines. Part III. A new method of preparation, 369.

Friend, *J. N.*, and **Hale,** *R. W.*, solubilities of the chlorides of lanthanum, praseodymium, and neodymium, 670.

G.

Gatty, *O.*, obituary notice of, 1440.

German, *W. L.*, and **Brandon,** *T. W.*, studies of ionisation in non-aqueous solvents. Part III. Formation of sulphides in methyl and in ethyl alcohol, 1329.

German, *W. L.*, and **Jamsett,** *R. A.*, studies of ionisation in non-aqueous solvents. Part IV. Formation of ammines in methyl and ethyl acetates and in acetone, 1360.

Gerrard, *W.*, studies on esters of sulphurous, chlorosulphinic, and chlorosulphonic acids. Part II., 218.

interaction of *n*-butyl alcohol and the chlorides and oxychloride of phosphorus in the absence and in the presence of pyridine, 1464.

Ghosh, *R.*, **Pascall,** *D. C. S.*, and **Todd,** *A. R.*, *Cannabis indica*. Part III. Synthesis of dibenzopyran derivatives, including an isomer cannabinol, 1118.

Ghosh, *R.*, **Todd,** *A. R.*, and **Wilkinson,** *S.*, *Cannabis indica*. Part IV. Synthesis of tetrahydrodibenzopyran derivatives. Part V. Synthesis of cannabinol, 1121, 1393.

Gibby, *C. W.*, and **Argument,** *C.*, adsorption at interface between two fluids. Part III. Adsorption of five dyes at a mercury–water interface, 596.

Gibson, *D. T.* See **Coats,** *R. R.*

Gibson, *G. M.* See **Challenger,** *F.*

Gillam, *A. E.* See **Aldersley,** *J. B.*, and **Booker,** *H.*

Gillespie, *D. T. C.*, **Macbeth,** *A. K.*, and **Mills,** *J. A.*, epimeric alcohols of the *cyclo*hexane series. Part III. Glucoside formation. Part IV. The parachor as a criterion for *cis–trans*-isomerism, 243, 280.

Gilmore, *J.* See **Campbell,** *N.*

Goodway, *N. F.*, and **West,** *T. F.*, condensation products from "α-terpinene" and the carenes with maleic anhydride, 702.

Goss, *F. R.*, magnitude of the solvent effect in dipole-moment measurement. Part II. Resolution of the solvent effect into its contributory factors. Part III. Polarisation and association of alcohols in the liquid phase, 752, 888.

Grimshaw, *D. C.*, **Guy,** *J. B.*, and **Smith,** *J. C.*, addition of hydrogen bromide to non-terminal double bonds; *iso*propylidene group; crotonic acid, 68.

Guichard, *M.* See **Baxter,** *G. P.*

Gulland, *J. M.*, and **Hobday,** *G. I.*, constitution of yeast ribonucleic acid. Part IV. Syntheses of uridylic and guanylic acids, uridine-5-phosphate and guanosine-5-phosphate, 746.

Gulland, *J. M.*, **Partridge,** *M. W.*, and **Randall,** *S. S.*, amino-acid and peptide esters of choline as possible analogues of the oxytocic hormone of the posterior lobe of the pituitary gland. Part I., 419.

Guy, *J. B.* See **Grimshaw,** *D. C.*

H.

Hahn, *O.* See **Aston,** *F. W.*

Hale, *R. W.* See **Friend,** *J. N.*

Halliday, (*Miss*) *H. M.*, and **Reade,** *T. H.*, action of nitrous acid on *p*-nitrodimethylaniline in hydrochloric acid, 138.

action of nitrous acid on formaldehyde, 142.

Hamer, (*Miss*) *F. M.*, bases of which methincyanines are the quaternary salts, 799.

Hammick, *D. L.*, and **Yule,** (*Miss*) *R. B. M.*, complex formation between polynitro-compounds and aromatic hydrocarbons and bases. Part IX. Influence of solvents on temperature coefficients of colour densities, 1539.

Harbard, *E. H.*, and **King,** *A.*, chromic oxide as an adsorbent, 19.

Harington, *C. R.*, synthetic immunochemistry, 119.

Harington, *C. R.*, and **Moggridge,** *R. C. G.*, experiments in the glutamic acid series, 706.

Harington, *C. R.*, and **Pitt-Rivers,** *R. V.*, new synthesis of thyronine, 1101.

Harkins, *W. D.* See **Aston,** *F. W.*

Harley-Mason, *J.*, and **Mann,** *F. G.*, quaterphenyl. Part I. Dihydroxy-derivatives, 1379.

Harper, *S. H.*, active principles of leguminous fish-poison plants. Part IV. Isolation of malaccol from *Derris malaccensis*. Part V. *Derris malaccensis* and *Tephrosia toxicaria*, 309, 1178.

Harrington, *T.* See **Dyson,** *G. M.*

Harris, *I. W. H.* See **Cheesman,** *G. H.*

Harris, *J. O.* See **Cocker,** *W.*

Harris, *W. E.* See **Bowden,** *S. T.*

Hart, *A. B.*, and **Partington,** *J. R.*, vanadium ion oxidation–reduction potentials, 1532.

Hartley, *T.*, obituary notice of, 1031.

Hartshorne, *N. H.* See **Elias,** *P. G.*

Haskelberg, *L.* See **Adler,** *S.*

Hawkins, *E. G. E.*, **Jones,** *J. K. N.*, and **Young,** *G. T.*, constitution of banana starch, 390.

Haworth, *J. W.*, **Heilbron,** *I. M.*, and **Hey,** *D. H.*, arylpyridines. Part I. Phenylpyridines and nitrophenylpyridines. Part III. Anisyl- and nitroanisyl-pyridines, 349, 358.

nitrosoacylarylamines. Part IV. Action of nitrosoacylarylamines on pyridine, 372.

Haworth, *J. W.*, and **Hey,** *D. H.*, nitrosoacylarylamines. Part II. Action of nitrous fumes on acylarylamines, 361.

Haworth, *J. W.* See also **Elks,** *J.*

Haworth, *R. D.*, and **Slinger,** *F. H.*, constituents of natural phenolic resins. Part XVII. Synthesis of *l*-matairesinol. Part XVIII. 1:2:3:4-Tetrahydronaphthalene-2:3-dicarboxylic acid and the 1-phenyl derivative, 1098, 1321.

Haworth, *W. N.*, **Jackson,** *J.*, and **Smith,** *F.*, properties of 3:6-anhydrogalactose, 620.

Haycock, *J.*, obituary notice of, 568.

Hayes, *H. T.*, and **Hunter,** *L.*, associating effect of the hydrogen atom. Part VI. Acid hydrazides, 332.

Heath-Brown, *B.*, **Heilbron**, *I. M.*, and **Jones**, *E. R. H.*, studies in the sterol group. Part XLII. Constitution of zymosterol, 1482.
Heddle, *W. J.*, and **Percival**, *E. G. V.*, fructose-methylphenylhydrazone, 1511.
Heilbron, *I. M.*, **Hey**, *D. H.*, and **Lambert**, *A.*, arylpyridines. Part IV. 3- and 4-Pyridyldiphenyls, 1279.
Heilbron, *I. M.* See also **Barnett**, (*Miss*) *J.*, **Butterworth**, *E. C.*, **Cross**, *L. C.*, **France**, *H.*, **Haworth**, *J. W.*, and **Heath-Brown**, *B.*
Hemming, (*Miss*) *M. L.* See **Baker**, *J. W.*
Hems, *B. A.*, and **Todd**, *A. R.*, synthesis of baeckeol, 1208.
Hepburn, *J. R. I.*, chemical nature of precipitated basic magnesium carbonate, 96.
Hewett, *C. L.*, polycyclic aromatic hydrocarbons. Part XXII., 293.
Hewett, *C. L.*, and **Martin**, *R. H.*, polycyclic aromatic hydrocarbons. Part XXVI. 1:2:3:4-Tetramethylphenanthrene, 1396.
Hewett, *C. L.* See also **Everett**, *J. L.*
Hey, *D. H.*, and **Lawton**, *S. E.*, syntheses of 2-phenylnaphthalenes, 374.
nitration of 6- and 7-methoxyaceto-2-naphthalide, 384.
Hey, *D. H.*, and **Wilkinson**, *R.*, preparation of 2-phenylnaphthalene from diphenyl, 1030.
Hey, *D. H.* See also **Butterworth**, *E. C.*, **Elks**, *J.*, **France**, *H.*, **Haworth**, *J. W.*, and **Heilbron**, *I. M.*
Heywood, *B. J.*, and **Kon**, *G. A. R.*, sapogenins. Part IX. Occurrence and constitution of bassic acid, 713.
Hickling, *A.*, and **Richards**, *S. H.*, studies in electrolytic oxidation. Part XII. Mechanism of the electrolytic formation of periodates, 256.
Hindley, *N. C.* See **Aldersley**, *J. B.*
Hinkel, *L. E.*, and **Watkins**, *T. I.*, studies on hydrogen cyanide. Part XI. Constitution of the double compound of hydrogen cyanide and aluminium chloride. Part XII. Asymmetry of the tetrapolymer of hydrogen cyanide, 407, 1206.
Hinshelwood, *C. N.* See **Danby**, *C. J.*, and **Poole**, (*Miss*) *E. A.*
Hobday, *G. I.* See **Gulland**, *J. M.*
Hodgson, *H. H.*, and **Foster**, *C. K.*, decomposition of *p*-hydroxybenzenediazonium salts by alcohols, 1150.
Hodgson, *H. H.*, and **Marsden**, *E.*, replacement of the diazo-group by hydrogen, 207.
studies in the diphenyl series. Part V. Preparation of asymmetrical diaryl derivatives, 208.
Hodgson, *H. H.*, and **Nicholson**, *D. E.*, action of nitrosylsulphuric acid on *m*-fluorophenol; new red *o*-quinoneimine, 205.
nitrosation of phenols. Part XVII. *o*-Fluorophenol, and comparative study of the four *o*-halogenophenols. Part XVIII. Synthesis of 3-fluoro-4-nitrosophenol and of 3-fluoro-6-nitrosophenol; comparison of stabilities of the 3-halogeno-4-nitrosophenols, 810, 1268.
Hönigschmid, *O.* See **Baxter**, *G. P.*
Holmes, *C. W. N.*, and **London**, *J. D.*, mobility of groups in benzonitriles, 1521.
Horrod, *G. W. T.*, obituary notice of, 569.
Hughes, *E. D.*, **Ingold**, *C. K.*, **Masterman**, *S.*, and **McNulty**, *B. J.*, mechanism of elimination reactions. Part V. Kinetics of olefin elimination from ethyl, *iso*propyl, *tert.*-butyl, and α- and β-phenylethyl bromides in acidic and in alkaline alcohol solution, 899.
Hughes, *E. D.*, **Ingold**, *C. K.*, and **Taher**, *N. A.*, mechanism of substitution at a saturated carbon atom. Part XVII. Polar effects in alkyl groups, as illustrated by solvolytic substitutions of *p*-alkylbenzhydryl chlorides, 949.
Hughes, *E. D.*, and **Taher**, *N. A.*, mechanism of substitution at a saturated carbon atom. Part XVIII. Polar effect of the carboxylate ion group as illustrated by hydrolysis of the bromomalonate and α-bromomethylmalonate ions, 956.
Hughes, *E. D.* See also **Bateman**, *L. C.*, and **Church**, *M. G.*
Hunter, *L.*, and **Marriott**, *J. A.*, associating effect of the hydrogen atom. Part V. Nitroarylhydrazones, 166.
Hunter, *L.* See also **Elkins**, (*Miss*) *M.*, and **Hayes**, *H. T.*
Huse, *G.*, and **Powell**, *H. M.*, crystal structure of picryl iodide, 1398.
Hutchison, *A. C.*, and **Reade**, *T. H.*, action of sodium nitrite on Michler's hydrol in hydrochloric acid, 93.

I.

Ingold, *C. K.* See **Bateman**, *L. C.*, **Church**, *M. G.*, and **Hughes**, *E. D.*
Irving, *H.*, interaction of arylhydrazines with halogenated aldehydes, 813.
Irving, *H.*, and **Marston**, *H.*, alleged reduction of the phenylurethane of trichlorolactic ester and nitrile by dilute aqueous alkali, 1512.
Ismail, *A. F. A.* See **Schönberg**, *A.*
Ives, *D. J. G.*, and **Kerlogue**, *R. H.*, isotopic exchange reactions of organic compounds. Part V. Kinetics of the isomerisation and the deuterium exchange reaction of Δ^{α}-pentenoic acid, 1362.

J.

Jackson, *H.*, and **Jones**, *E. R. H.*, studies in the sterol group. Part XL. Bromination of 7-ketocholesteryl acetate, 659.
Jackson, *J.*, and **Smith**, *F.*, constitution of arabic acid. Part III. Isolation of methyl heptamethyl aldobionate from methylated degraded arabic acid. Part IV. Formation of 3-galactosidogalactose by hydrolysis of degraded arabic acid, 74, 79.
Jackson, *J.* See also **Haworth**, *W. N.*
Jacob, (*Miss*) *A.*, **Sutcliffe**, *F. K.*, and **Todd**, *A. R.*, studies on vitamin-*E*. Part VII. Homologues of α-tocopherol, 327.
Jacob, (*Miss*) *A.*, and **Todd**, *A. R.*, *Cannabis indica*. Part II. Isolation of cannabidiol from Egyptian hashish; structure of cannabinol, 649.
James, *J. E. D.* See **Elias**, *P. G.*
Jamison, (*Miss*) *M. M.*, and **Turner**, *E. E.*, optical activation of acids, and a new resolution process, 264.
Jamsett, *R. A.* See **German**, *W. L.*
Jeffery, *G. H.* See **Cowan**, *D. M.*
Jenkins, *H. O.*, dissociation constants, activation energies, and resonance, 1447.
John, *T.*, and **Bowden**, *S. T.*, formation of ketyls by the action of potassium on benzpinacol, 251.
John, *T.* See also **Bowden**, *S. T.*
Joliot, *F.* See **Aston**, *F. W.*
Jones, *E. R. H.*, and **Meakins**, *R. J.*, lupanetriol and its oxidation, 456.
oxidation of lupenyl esters, 1335.
Jones, *E. R. H.*, and **Verrill**, *K. J.*, an enol-acetate in the triterpene series, 1512.
Jones, *E. R. H.* See also **Barnett**, (*Miss*) *J.*, **Cross**, *L. C.*, **Heath-Brown**, *B.*, and **Jackson**, *H.*
Jones, *J. K. N.* See **Hawkins**, *E. G. E.*
Jorissen, *W. P.*, **Bassett**, *H.*, **Damiens**, *A.*, **Fichter**, *F.*, and **Remy**, *H.*, report of the Committee for the Reform of Inorganic Chemical Nomenclature, 1404.

K.

Kefford, *J. F.*, attempted synthesis of papaverine, 1209.
Kenyon, *J.*, and **Young**, *D. P.*, racemisation of carboxylic esters by sodium ethoxide and its bearing on Claisen's condensation, 216.
composition of Ponndorff–Meerwein reduction product of mesityl oxide, 1547.
Kenyon, *J.* See also **Balfe**, *M. P.*, and **Collyer**, *T. A.*
Kerlogue, *R. H.* See **Ives**, *D. J. G.*
Kermack, *W. O.*, and **Tebrich**, *W.*, pyridine and piperazine derivatives of sulphanilamide, 202.
attempts to find new antimalarials. Part XVI. Synthesis of derivatives of 4-carboline and 5:6-benz-4-carboline, 314.
Kermack, *W. O.*, and **Weatherhead**, (*Miss*) *A. P.*, attempts to find new antimalarials. Part XVII. Derivatives of 5:6:3′:2′-pyridoquinoline, 1164.
King, *A.*, and **Wrzeszinski**, *G. W.*, factors in stabilisation of emulsions, 1513.
King, *A.* See also **Chambers**, *H. H.*, and **Harbard**, *E. H.*
King, *H.*, curare alkaloids. Part V. Alkaloids of some *Chondrodendron* species and the origin of Radix pareiræ bravæ, 737.
King, *H.*, and **Work**, *T. S.*, antiplasmodial action and chemical constitution. Part III. Carbinolamines derived from naphthalene and quinoline, 1307.
Kipping, *F. B.*, and **Wild**, *F.*, interaction of β-ionone with halides in presence of lithium, and synthesis of 1:6-dimethylnaphthalene, 1239.
Königstein, (*Miss*) *M.* See **Britton**, *H. T. S.*
Kon, *G. A. R.*, and **Soper**, *H. R.*, sapogenins. Part VIII. Sapogenin of fuller's herb, 617.
conversion of quillaic acid into a hydrocarbon, 1335.
Kon, *G. A. R.* See also **Bilham**, *P.*, **Elliott**, *D. F.*, and **Heywood**, *B. J.*

L.

Labriola, *R.* See **Deulofeu**, *V.*
Lamb, *M. C.*, obituary notice of, 569.
Lambert, *A.* See **Heilbron**, *I. M.*
Langmuir, *I.*, monolayers on solids, 511.
Lapsley, *R. W.*, **Robertson**, *J.*, and **Patterson**, *T. S.*, studies in optical superposition. Part IX. *l*-Menthyl esters of mucic and tetrahydroxyadipic [$^{0}_{1.2.3.4}$] acids, 862.
Lawton, *S. E.* See **Hey**, *D. H.*
Leavitt, *J. J.* See **Barrett**, *P. A.*
Lewis, *D. T.*, physical properties of aliphatic acid anhydrides, 32.
organic derivatives of sulphur, selenium, and tellurium. Part I., 831.
Lidstone, *A. G.*, separation of β-picoline, γ-picoline, and 2:6-lutidine from their mixture, 241.
Linde, *H. T. G. van der*, obituary notice of, 570.
Linstead, *R. P.*, and **Michaelis**, *K. O. A.*, dehydrogenation. Part III. Formation of naphthols from alcohols and ketones of the hydronaphthalene group, 1134.
Linstead, *R. P.*, **Michaelis**, *K. O. A.*, and **Thomas**, *S. L. S.*, dehydrogenation. Part IV. Catalytic disproportionation and dehydrogenation of some terpenes and terpene ketones, 1139.
Linstead, *R. P.*, and **Rowe**, *G. A.*, phthalocyanines and related compounds. Part XVII. Intermediates for preparation of tetrabenzporphins; acids derived from phthalimidine, 1070.
Linstead, *R. P.*, and **Thomas**, *S. L. S.*, dehydrogenation. Part II. Elimination and migration of methyl groups from quaternary carbon atoms during catalytic dehydrogenation, 1127.
Linstead, *R. P.* See also **Barrett**, *P. A.*, and **Burnop**, *V. C. E.*
Little, *A. J.*, **M'Lean**, *J.*, and **Wilson**, *F. J.*, preparation of optically active semicarbazides and resolution of benzoin, 336.
Lloyd, *P. G.*, obituary notice of, 104.
Loofbourow, *J. R.*, and **Stimson**, (*Miss*) *M. M.*, ultra-violet absorption spectra of nitrogenous heterocyclic compounds. Part I. Effect of p_H and irradiation on spectrum of adenine. Part II. Effect of p_H and irradiation on spectrum of barbituric acid, 844, 1275.
Lorber, *J.* See **Bacon**, *J. S. D.*, and **Bell**, *D. J.*
Loudon, *J. D.*, reactions of 2:6-dichloro- and 2:4:6-trihalogeno-nitrobenzenes with a mercaptide reagent, 1525.
Loudon, *J. D.* See also **Holmes**, *C. W. N.*
Lowe, *A. J.* See **Miller**, (*Miss*) *C. C.*
Luckett, (*Miss*) *S.*, and **Smith**, *F.*, constitution of pectic acid. Part I. Methylation of pectic acid and isolation of the methyl ester of 2:3-dimethyl methylgalacturonoside. Part II. Synthesis of the methyl ester of 2:3:5-trimethyl β-methylgalacturonoside. Part III. Hydrolysis of the methyl ester of methylated pectic acid and isolation of the methyl ester of 2:3-dimethyl β-methylgalactopyruronoside, 1106, 1114, 1506.
Ludlam, *E. B.* See **Wyllie**, *D.*
Lyne, *R. R.*, **Peat**, *S.*, and **Stacey**, *M.*, polysaccharides. Part XXXIX. Constitution of certain levans formed by bacterial action, 237.

M.

Macbeth, *A. K.* See **Cooke**, *R. G.*, and **Gillespie**, *D. T. C.*
McClelland, *E. W.*, **Rose**, *M. J.*, and **Bartlett**, *R. G.*, reaction of acylbenz*iso*thiazolones with acetic anhydride and potassium acetate, 323.
Maccormac, *M.*, and **Townend**, *D. T. A.*, mechanism by which "cool" flames give rise to "normal" flames. Part III. Physical characteristics of the two-stage process of ignition of ether–oxygen mixtures. Part IV. Chemical character of the "blue" flame initiated in the "cool" flame products of ether–oxygen mixtures, 143, 151.
McGookin, *A.*, **Robertson**, *A.*, and **Whalley**, *W. B.*, chemistry of the "insoluble red" woods. Part I. Pterocarpin and homopterocarpin, 787.
McKenzie, *A.*, and **Winton**, *E. R.*, action of Grignard reagents on methyl *r*-tropate and on methyl atropate, 840.
Maclaurin, *J. S.*, obituary notice of, 571.
M'Lean, *J.* See **Little**, *A. J.*
McLennan, *I. C.* See **Miller**, (*Miss*) *C. C.*
McNulty, *B. J.* See **Hughes**, *E. D.*
Mander, *P. G.*, obituary notice of, 1441.
Mann, *F. G.*, and **Purdie**, *D.*, constitution of complex metallic salts. Part XII. Bridged compounds containing two different metallic atoms. Part XIII. Stability of the 4-covalent auric complex, 1230, 1235.
Mann, *F. G.* See also **Chatt**, *J.*, **Evans**, *R. C.*, and **Harley-Mason**, *J.*
Mann, *P. J. G.* See **Saunders**, *B. C.*
Marriott, *J. A.* See **Hunter**, *L.*
Marsden, *A.* See **Maxted**, *E. B.*
Marsden, *E.* See **Hodgson**, *H. H.*
Marston, *H.* See **Irving**, *H.*
Martin, *J. F.* See **Farmer**, *E. H.*
Martin, *R. H.* See **Cook**, *J. W.*, and **Hewett**, *C. L.*
Martin, *W. F.*, and **Mitchell**, *W.*, minor alkaloids of *Duboisia myoporoides*. Part III. Valeroidine, 1155.
Masterman, *S.* See **Hughes**, *E. D.*

Mawer, *W. F.*, obituary notice of, 572.
Maxted, *E. B.*, and **Marsden**, *A.*, catalytic toxicity and chemical structure. Part VI. Poisoning of platinum catalysts by metals, 469.
Maxted, *E. B.*, and **Morrish**, *R. W. D.*, catalytic toxicity and chemical structure. Part V. Simple anions containing toxic elements, 252.
Meakins, *R. J.* See **Jones**, *E. R. H.*
Michaelis, *K. O. A.* See **Linstead**, *R. P.*
Miller, (*Miss*) *C. C.*, volumetric determination of small quantities of barium and sulphate with barium rhodizonate as an indicator; determination of sulphur in iron pyrites, 401.
Miller, (*Miss*) *C. C.*, and **Lowe**, *A. J.*, qualitative semimicro-analysis with reference to Noyes and Bray's system; the tantalum and the tungsten group; the gold group, 1258, 1263.
Miller, (*Miss*) *C. C.*, and **McLennan**, *I. C.*, 8-hydroxyquinoline as a reagent for the determination of magnesium, especially in carbonate and silicate rocks, 656.
Mills, *J. A.* See **Gillespie**, *D. T. C.*
Milton, *G. J. G.* See **Crowley**, *G. P.*
Mitchell, *S.*, and **Simpson**, *G. K.*, rotatory dispersion and circular dichroism of *l*-menthyl α-β-chloro-β-nitrosobutyrate, 784.
Mitchell, *W.*, acetylation of *d*-ψ-ephedrine and *l*-ephedrine, 1153.
Mitchell, *W.* See also **Martin**, *W. F.*
Mitra, *S. K.* See **Chakrabarty**, *N. K.*
Moelwyn-Hughes, *E. A.*, influence of a solvent on the strength of the hydrogen bridge, 850.
Moggridge, *R. C. G.* See **Harington**, *C. R.*
Morice, (*Miss*) *I. M.*, and **Simpson**, *J. C. E.*, triterpene group. Part VII. Minor triterpenoid constituents of Manila elemi resin, 795.
Morrish, *R. W. D.* See **Maxted**, *E. B.*
Morrison-Jones, *C. R.* See **Farmer**, *E. H.*
Morton, *R. A.*, and **Sawires**, *Z.*, rottlerin. Part VI. Spectrographic study of rottlerin and its derivatives, 1052.
Morton, *R. A.*, and **Stubbs**, *A. L.*, absorption spectra of hydroxy-aldehydes, hydroxy-ketones, and their methyl ethers, 1347.
Muir, *J. R.*, and **Percival**, *E. G. V.*, cellobiosazone, galactosazone, and other sugar osazones, 1479.
Mullan, *J.*, and **Percival**, *E. G. V.*, studies on seed mucilages. Part I. Preliminary examination of the mucilaginous polysaccharide of the seeds of *Plantago lanceolata*, 1501.
Muller, *S.*, and **Cobb**, *J. W.*, steam–carbon complex, 177.
Mulliken, *R. S.* See **Aston**, *F. W.*
Munk, (*Miss*) *I.* See **Baker**, *W.*

N.

Neubauer, *L. G.* See **Brandt**, *C. W.*
Neuberger, *A.*, chemical proof of cyclic structure of glucosaminides, 29.
Newitt, *D. M.*, and **Wassermann**, *A.*, kinetics of a diene association under constant volume conditions, 735.
Nicholson, *D. E.* See **Hodgson**, *H. H.*

O.

Oliphant, *M. L.* See **Aston**, *F. W.*
Openshaw, *H. T.* See **Blount**, *B. K.*

P.

Parkes, *G. D.*, and **Walton**, *G. N.*, octahydrodinaphthyline and octahydronaphthidine, 201.
Partington, *J. R.* See **Hart**, *A. B.*
Partridge, *M. W.* See **Gulland**, *J. M.*
Pascall, *D. C. S.* See **Ghosh**, *R.*
Patterson, *T. S.*, and **Buchanan**, *C.*, influence of solvents and other factors on rotation of optically active compounds. Part XXXVIII. Asymmetric solvent action, 290.
Patterson, *T. S.* See also **Lapsley**, *R. W.*
Peat, *S.*, and **Whetstone**, *J.*, acetolysis of methylated starch, 267.
Peat, *S.* See also **Lyne**, *R. R.*
Peiser, *H. S.* See **Evans**, *R. C.*
Penfold, *A. R.*, and **Simonsen**, *J. L.*, calythrone, 412.
Percival, *E. G. V.*, and **Soutar**, *T. H.*, carbohydrate sulphuric esters. Part I. Glucose and galactose sulphates, 1475.
Percival, *E. G. V.* See also **Heddle**, *W. J.*, **Muir**, *J. R.*, and **Mullan**, *J.*
Péteri, *E.*, new synthesis of 4:4′-dimethoxy-αα′-diethylstilbene, 833.
Petrow, *V. A.*, preparation of $\Delta^{4:5}$-cholestadien-3(β)-ol, 66.
Petrow, *V. A.*, and **Starling**, *W. W.*, steroids and related compounds. Part V. Steroid diosphenols, 60.
Philpot, (*Miss*) *J. P.*, **Rhodes**, *E. C.*, and **Davies**, *C. W.*, determination of mobilities and dissociation constants by means of conductivity titrations, 84.
Picard, *C. W.*, and **Spring**, *F. S.*, triterpene resinols and related acids. Part X. β-Amyradienol. Part XI. Oxidation of acetyloleanolic acid and of methyl acetyloleanolate with perbenzoic acid, 1198, 1387.
Pink, *R. C.*, studies in water-in-oil emulsions. Part III. Effect of relative phase volumes on type of emulsions stabilised by magnesium oleate, 211.
Pinkerton, *A.*, obituary notice of, 1031.
Pitt-Rivers, *R. V.* See **Harington**, *C. R.*
Plant, *S. G. P.*, and **Whitaker**, *W. D.*, structural problems in the indole group. Part IV. Alternative method for determining structure of nitro-compounds, 283.
Poole, (*Miss*) *E. A.*, and **Hinshelwood**, *C. N.*, physico-chemical aspects of bacterial growth. Part VI. Influence of toxic substances on growth rate, stationary population, and fermentation reactions of *Bact. lactis ærogenes*. Part VII. Influence of phenol on death rate of *Bact. lactis ærogenes*, 1565, 1573.
Porritt, *B. D.*, obituary notice of, 572.
Powell, *H. M.* See **Huse**, *G.*
Price, *J. R.*, and **Robinson**, (*Sir*) *R.*, dunnione. Part II., 1493.
Pryde, *A. W. H.*, and **Rule**, *H. G.*, solvent effects with optically active saturated hydrocarbons, 345.
Purdie, *D.* See **Evans**, *R. C.*, and **Mann**, *F. G.*

R.

Raistrick, *H.* See **Anslow**, *W. K.*
Ramage, *G. R.*, and **Stowe**, *W. J. I.*, structure and synthesis of bæckeol, 425.
Ramage, *G. R.* See also **Bennett**, *D. J.*
Randall, *S. S.* See **Gulland**, *J. M.*

Rapson, *W. S.*, constituents of leaves of *Leucadendron* species. Part III. Oxidations of leucodrin derivatives with periodic acid and lead tetra-acetate, 1271.

Rapson, *W. S.*, and **Shuttleworth,** *R. G.*, stable and labile semicarbazones from methyl *n*-amyl ketone, 99.

production of polycyclic aromatic types through the *cyclo*dehydration of unsaturated ketones, 636.

Read, *D. R.*, and **Taylor,** *W.*, steric course of hydrolysis of α-phenylethyl chloride in acetone containing mercuric chloride, 679.

Reade, *T. H.* See **Crowley,** *G. P.*, **Halliday,** (*Miss*) *H. M.*, and **Hutchison,** *A. C.*

Remy, *H.* See **Jorissen,** *W. P.*

Rhodes, *E. C.* See **Philpot,** (*Miss*) *J. P.*

Richards, *S. H.* See **Hickling,** *A.*

Rideal, *E. K.*, Soren Peter Lauritz Sörensen, 554.

Ritchie, *M.*, and **Smith,** *R. L.*, photoexpansion of chlorine; recombination of chlorine atoms, 394.

Ritchie, *M.* See also **Wyllie,** *D.*

Roberts, *J. K.*, monolayers on solids, 773.

Robertson, *A.* See **McGookin,** *A.*

Robertson, *G. J.*, obituary notice of, 104.

Robertson, *G. J.*, and **Whitehead,** *W.*, Walden inversion in the altrose series, 319.

Robertson, *J.* See **Lapsley,** *R. W.*

Robertson, *J. M.*, and **Woodward,** (*Miss*) *I.*, *X*-ray study of phthalocyanines. Part IV. Direct quantitative analysis of the platinum compound, 36.

Robinson, (*Mrs.*) *A. M.* See **Cook,** *J. W.*

Robinson, (*Sir*) *R.*, presidential address, 505.

Robinson, (*Sir*) *R.* See also **Price,** *J. R.*

Robson, *J. M.* See **Schönberg,** *A.*

Roe, (*Miss*) *E. M. F.* See **Cohen,** *A.*

Rose, *M. J.* See **McClelland,** *E. W.*

Rothstein, *E.*, experiments with thioacetals and related substances. Part I. Polar effect of sulphur in thioacetals. Part II. Reaction between α-bromopropaldehyde diethylacetal and ethylthiol. Part III. Comparison of polar effect of sulphur with that of oxygen and nitrogen, 1550, 1553, 1558.

influence of poles and polar linkings on tautomerism in the simple three-carbon system. Part VI. Unbalanced systems, 1560.

Rowe, *G. A.* See **Barrett,** *P. A.*, and **Linstead,** *R. P.*

Rule, *H. G.* See **Pryde,** *A. W. H.*

Rundall, *F. G.* See **Barrett,** *P. A.*

S.

Saunders, *B. C.*, and **Mann,** *P. J. G.*, studies in peroxidase action. Part II. Oxidation of *p*-toluidine, 769.

Sawires, *Z.* See **Morton,** *R. A.*

Scammell, *L. R.*, obituary notice of, 1032.

Schnitzer, *J.* See **Breuer,** *G.*

Schönberg, *A.*, and **Ismail,** *A. F. A.*, colour reaction of maleic anhydride, *p*-benzoquinone, their partially substituted derivatives, and citric acid; some zwitterions, 1374.

Schönberg, *A.*, **Robson,** *J. M.*, **Tadros,** *W.*, and **Fahim,** *H. A.*, synthetic œstrogens related to triphenylethylene, 1327.

Scott, *G. B.*, obituary notice of, 1032.

Sebba, *F.*, and **Briscoe,** *H. V. A.*, evaporation of water through unimolecular films, 106.

variation of solubility of unimolecular films with surface pressure, and its effect on measurement of true surface pressure, 114.

new "ageing" phenomenon in unimolecular films on water, 128.

Shah, *H. A.*, and **Shah,** *R. C.*, γ-substitution in the resorcinol nucleus. Part V. Gatterman reaction with 4-acylresorcinols, 245.

Shah, *R. C.* See **Acharya,** *B. G.*, **Shah,** *H. A.*, **Shenoi,** *R. B.*, and **Ullal,** *V. V.*

Shenoi, *R. B.*, **Shah,** *R. C.*, and **Wheeler,** *T. S.*, chalkones; production of *iso*oxazoles from chalkone derivatives, 247.

Sherred, *J. A.* See **Bell,** *R. P.*

Shutt, *F. T.*, obituary notice of, 1442.

Shuttleworth, *R. G.* See **Rapson,** *W. S.*

Simmonds, *W. H. C.* See **Baker,** *W.*

Simonsen, *J. L.* See **Bennett,** *D. J.*, **Carter,** *F. D.*, **Copp,** *F. C.*, and **Penfold,** *A. R.*

Simpson, *G. K.* See **Mitchell,** *S.*

Simpson, *J. C. E.*, triterpene group. Part VI. Oxidation of β-amyrin benzoate; new route to the thio-compound, $C_{36}H_{44}OS$, 230.

Simpson, *J. C. E.* See also **Morice,** (*Miss*) *I. M.*

Slinger, *F. H.* See **Haworth,** *R. D.*

Smith, *A.*, obituary notice of, 1033.

Smith, *F.*, constitution of arabic acid. Part V. Methylated arabic acid, 1035.

Smith, *F.* See also **Haworth,** *W. N.*, **Jackson,** *J.*, and **Luckett,** (*Miss*) *S.*

Smith, *G. F.*, refractivity of formamide, 869.

Smith, *J. C.* See **Grimshaw,** *D. C.*

Smith, *R. L.* See **Ritchie,** *M.*

Soliman, *G.* See **Zaki,** *A.*

Soper, *H. R.* See **Elliott,** *D. F.*, and **Kon,** *G. A. R.*

Soutar, *T. H.* See **Percival,** *E. G. V.*

Speakman, *J. B.* See **Elliott,** *G. H.*

Speakman, *J. C.*, determination of the thermodynamic dissociation constants of dibasic acids, 855.

Spence, *R.*, micro-analysis of gases, 1300.

Spring, *F. S.* See **Ewen,** *E. S.*, and **Picard,** *C. W.*

Stacey, *M.*, and **Woolley,** *J. M.*, nature of the carbohydrate residue in ovomucoid. Part I. Glucosamine constituent, 184.

Stacey, *M.* See also **Lyne,** *R. R.*

Starling, *W. W.* See **Petrow,** *V. A.*

Stevens, *T. S.* See **Cowper,** *R. M.*

Stimson, (*Miss*) *M. M.* See **Loofbourow,** *J. R.*

Stoddart, *E. M.*, kinetics of inhibition of reaction between chlorine and nitric oxide, 823.

Stowe, *W. J. I.* See **Ramage,** *G. R.*

Stubbs, *A. L.* See **Morton,** *R. A.*

Sturrock, *J. G. R.* See **Bell,** *R. P.*

Sutcliffe, *F. K.* See **Jacob,** (*Miss*) *A.*

Sutton, *L. E.*, present state of valency theory, 544.

Swanson, *T. B.* See **Cooke,** *R. G.*

T.

Tadros, *W.* See **Schönberg,** *A.*

Taher, *N. A.* See **Bateman,** *L. C.*, **Church,** *M. G.*, and **Hughes,** *E. D.*

Taylor, *W.* See **Read,** *D. R.*

Tebrich, *W.* See **Kermack,** *W. O.*

Thomas, *S. L. S.* See **Linstead,** *R. P.*

Thomas, *T. L.* See **Bowden,** *S. T.*

Todd, *A. R.* See **Blount,** *B. K.*, **Ghosh,** *R.*, **Hems,** *B. A.*, and **Jacob,** (*Miss*) *A.*

Todd, *W. M.* See **Crowley,** *G. P.*

Topp, *N. E.*, and **Davies,** *C. W.*, extent of dissociation of salts in water. Part IX. Calcium and barium salts of dicarboxylic acids, 87.

Townend, *D. T. A.* See **Maccormac,** *M.*

Trotter, *J.*, obituary notice of, 105.

Tuey, *G. A. P.* See **Barrett,** *P. A.*

Turner, *D. G.* See **Cocker,** *W.*

Turner, *E. E.* See **Jamison,** (*Miss*) *M. M.*

U.

Ullal, *V. V.*, **Shah**, *R. C.*, and **Wheeler**, *T. S.*, chromones of the naphthalene series. Part III. Rapid quantitative transformation at room temperature of *o*-aroyloxyacetoarones into *o*-hydroxydiaroylmethanes, 1499.

V.

Verrill, *K. J.* See **Barnett**, (*Miss*) *J.*, and **Jones**, *E. R. H.*
Vogel, *A. I.* See **Cowan**, *D. M.*

W.

Walker, *J.*, N^4-diethylaminoalkyl-N^1-dialkylsulphanilamides and related compounds, 686.
the synthesis of $\omega\omega'$-bis-2′-amino-4′-thiazolylalkanes and N^4-2′-thiazolylsulphanilamides, 1304.
Walton, *E.*, reactions of $\Delta^{\beta\text{-}\gamma}$-lactones, 438.
Walton, *G. N.* See **Parkes**, *G. D.*
Wassermann, *A.* See **Newitt**, *D. M.*
Waters, *W. A.*, 3:4′-dinitrodiphenyl, 474.
Watkins, *T. F.* See **Bowden**, *S. T.*
Watkins, *T. I.* See **Hinkel**, *L. E.*
Watts, *J. I.*, obituary notice of, 1033.
Weatherhead, (*Miss*) *A. P.* See **Kermack**, *W. O.*
Welford, *G.* See **Britton**, *H. T. S.*
West, *T. F.*, application of the diene synthesis to terpenoid compounds; eucarvone and maleic anhydride, 1162.
West, *T. F.* See also **Goodway**, *N. F.*
Whalley, *W. B.* See **McGookin**, *A.*
Wheeler, *R. V.*, obituary notice of, 573.
Wheeler, *R. V.* See also **Belcher**, *R.*
Wheeler, *T. S.* See **Acharya**, *B. G.*, **Shenoi**, *R. B.*, and **Ullal**, *V. V.*
Whetstone, *J.* See **Peat**, *S.*
Whitaker, *W. D.* See **Plant**, *S. G. P.*
White, *T.*, studies in the amino-sugars. Part II. Action of dilute alkali solution on *N*-acylglucosamines, 428.
Whitehead, *R. L. St. D.* See **Bell**, *R. P.*
Whitehead, *W.* See **Robertson**, *G. J.*
Whytlaw-Gray, *R.* See **Baxter**, *G. P.*
Wild, *F.* See **Kipping**, *F. B.*
Wilkins, *C. J.*, reduction of nitrosylsulphuric acid by sulphur monoxide, 1157.
Wilkinson, *R.* See **Hey**, *D. H.*
Wilkinson, *S.* See **Ghosh**, *R.*
Williams, *G.*, kinetics of catalysed polymerisation of styrene. Part III. Mechanism of metal chloride catalysis, 775.
Williams, *H. O.* See **Carter**, *F. D.*
Williams, *R. T.*, tetra-acetyl aldehydophenylglucosides, 1402.
Williams, *T.*, obituary notice of, 1034.
Wilson, *F. J.* See **Little**, *A. J.*
Winter, *E. R. S.*, **Carlton**, *M.*, and **Briscoe**, *H. V. A.*, interchange of heavy oxygen between water and inorganic oxy-anions, 131.
Winton, *E. R.* See **McKenzie**, *A.*
Woodward, (*Miss*) *I.*, *X*-ray studies of the porphins, 601.
Woodward, (*Miss*) *I.* See also **Robertson**, *J. M.*
Woolley, *J. M.* See **Stacey**, *M.*
Work, *T. S.*, antiplasmodial action and chemical constitution. Part IV. Synthesis of complex carbinolamines and polyamines, 1315.
Work, *T. S.* See also **King**, *H.*
Wright, *R.*, relation between the coefficient of thermal expansion and structure of solutions, 870.
Wright, (*Mrs.*) *W. G.*, chelation in the potassium compounds of carboxylic and sulphinic acids, 859.
Wrzeszinski, *G. W.* See **King**, *A.*
Wyllie, *D.*, **Ritchie**, *M.*, and **Ludlam**, *E. B.*, reaction between phosphorus and iodine in carbon tetrachloride solution, 583.

Y.

Young, *D. P.* See **Kenyon**, *J.*
Young, *G. T.* See **Hawkins**, *E. G. E.*
Yule, (*Miss*) *R. B. M.* See **Hammick**, *D. L.*

Z.

Zaki, *A.*, and **Soliman**, *G.*, constituents of the petroleum extract of *Zea mays* stigmas, 1545.

INDEX OF SUBJECTS, 1940.

A.

Acenaphthene, bromonitro-derivatives, 450.
Acetanilide, *o*-chloronitroso-, 367.
Acetic acid, distribution of, between benzene and water, 850.
lead salt, reaction of, with ethylene glycol, 82.
*iso*pentenyl ester, 1177.
sodium salt, hydrolysis of, 580.
Acetic acid, cyano-, ethyl ester, refractive index of, 1528.
Acetoacetic acid, action of, on cinnamyl alcohol and phenylvinylcarbinol, 1266.
ethyl ester, action of, on geraniol and linalool, 704.
Aceto-αβ-di-*p*-chlorophenylhydrazide, 335.
Aceto-αβ-di-*p*-tolylhydrazide, 335.
Acetone, dielectric constant of, 894.
δ-(α-phenylpropyl)semicarbazones, 337.
Acetophenone, reaction of, with benzaldehyde, 1295.
Acetophenone, hydroxy-derivatives, spectra of, absorption, 1351.
m-nitro-, diphenylhydrazone, 170.
Aceto-β-phenyl-α-*p*-tolylhydrazide, 335.
3(β)-Acetoxy-$\Delta^{4:8}$-cholestadiene, 67.
3-Acetoxycholestan-4-one 5:6-oxide, 63.
***cis*-3-Acetoxy-Δ^{5}-cholesten-4-ol**, and its dibromide, 63.
3-Acetoxy-Δ^{5}-cholesten-4-one, 64.
4-Acetoxy-2:6-dibenzylidene*cyclo*hexanone, 14.
2-Acetoxy-2:4:4:7:4′-pentamethylflavan, 1105.
Acetyl-3:4-benzphenanthrenes, and their semicarbazones, 1160.
1-Acetylbenz*iso*thiazolone, 1-chloro-, 325.
2-Acetylcarbamyl-1-thionaphthen, 3-hydroxy-, and its acetyl derivative, 327.
1-Acetyl-2:3-dimethyl-2:3-dihydroindole, 2:3-*di*hydroxy-, and 3:6-*di*nitro-2-hydroxy-, 286.
2-Acetyl-3:3-dimethylphthalimidine, 1088.
N^4-Acetyl-N^1-dimethylsulphanilamide, 688.
Acetyl-*l*-ephedrine, 1154.
Acetyl-α-ψ-ephedrine, and its salts, and nitroso-, 1154.
N^4-Acetyl-N^1-ethylsulphanilamide, 690.
N^4-Acetyl-N^4-ethylsulphanilamide, 690.
N^4-Acetyl-N^1-ethylsulphanilamidoacetic acid, amide and nitrile, 1576.
***N*-Acetyl-4:2′-*di*fluoro-2:4′-diacetoxydiphenylamine**, 206.
***N*-Acetyl-4:4′-*di*fluoro-2:2′-diacetoxydiphenylamine**, 207.
***N*-Acetylglucosamine**, 433.
N^4-Acetyl-N^1-methylsulphanilamidoacetic acid, amide and nitrile, 1576.
Acetyloleanolic acid, methyl ester, oxide, 1389.
oxidation of, and of its methyl ester, with perbenzoic acid, 1387.
Acetyloleanolic acid, hydroxy-, lactone, 1389.
N^4-Acetyl-N^1-pentamethylenesulphanilamide, 689.
3-Acetyl-6-phenylacetylcoumarin, 5-hydroxy-, 247.
γ-Acetyl-α-phenylbutyric acid, and its derivatives, and α-cyano-, ethyl ester, 849.
3-Acetyl-6-propionylcoumarin, 5-hydroxy-, 246.
N^4-Acetylsulphanilamidoacetic acid, amide and nitrile of, 1575.
8-Acetyltetrahydropentindole, 5-chloro-6:10-*di*nitro-9-hydroxy-, 285.
8-Acetyltetrahydropentindole, 6:10-*di*nitro-9-hydroxy-, 285.
Acids, aliphatic lower, ethyl esters, hydrolysis of, 339.
*di*basic, thermodynamic dissociation constants of, 855.
carboxylic, esters, racemisation of, by sodium ethoxide, 216.
*di*carboxylic, barium and calcium salts, dissociation constants of, 87.
complex, physico-chemical studies of, 764, 895.
dissociation constants of, 1447.
optical activation of, 264.
Acid anhydrides. See under Anhydrides.
Activation energy in relation to dissociation constants and resonance, 1447.
Acylarylamines, action of nitrous gases on, 361.
Acylarylamines, nitroso-, 361, 369, 372.
Acylbenz*iso*thiazolones, reaction of, with acetic anhydride and potassium acetate, 323.
***N*-Acylglucosamines**, action of dilute alkali solution on, 428.
4-Acylresorcinols, Gattermann reaction with, 245.
Address, presidential, 505.
Adenine, spectrum of, absorption ultra-violet, 844.
Adipic acid, thermodynamic dissociation constants of, 858.
Adipic acid, *tetra*hydroxy-, and its derivatives, 865.
Adsorption, discontinuous, 156.
interfacial, between two fluids, 596.
Alcohols, dielectric polarisation of, and their solutions, 888.
of *cyclo*hexane series, 243.
reactivity of, effect of long- and short-lived radicals on, 880.
αβ-unsaturated, addition of, to methylene groups, 704.
βγ-unsaturated, addition of, to active methylene groups, 1266.
Aldehydes, halogenated, reaction of, with arylhydrazines, 813.
Aldehydo-2:4-dimethyl 3:6-anhydrogalactose, 625.
2-Aldehydo-5-methoxyphenoxyacetic acid, and its ethyl ester, 2:4-dinitrophenylhydrazones, 794.
Alizarin, aluminium lakes of, 603.
Alkaloids, curare, 737.
of *Duboisia myoporoides*, 1155.
Alkyl groups, polar effects in, 949.
halides, unimolecular solvolysis of, 960, 966, 971, 974, 979.
Alkylamino-acids, preparation of, and their electrometric titration, 1290.
4-Alkylaminoazobenzene-4′-arsonic acids, synthesis of, 576.
***p*-Alkylbenzhydryl** chlorides, substitution in, 949.
halides, hydrolysis of, in aqueous acetone, 971.
Alkyl ketones, constitution, physical properties, and preparation of, 171.
1-Allyl*cyclo*hexanyl 3:5-*di*nitrobenzoate, 14.
Allylidene*cyclo*hexane, preparation and spectrum of, 1462.
Altrose series, Walden inversion in, 319.
Aluminium chloride, compound of, with hydrogen cyanide, 407.
Aluminium lakes of azo-dyes, structure of, 603.

Amines, aromatic, nuclear alkylation of, 388.
tertiary, action of nitrous acid on, 1286.
Amino-sugars, 428.
Ammines, formation of, in acetone and in ethyl and methyl acetates, 1360.
***n*-Amylaminoacetic acid**, and its derivatives, 1292.
4-Amylaminoazobenzene-4′-arsonic acids, 577.
5-*n*-Amyl-1:2-benzanthracene, 304.
5-*n*-Amyl-7:8-dihydro-1:2-benzanthracene, 304.
β-Amyradienol, and its derivatives, 1198.
β-Amyradienone, and its oxime, 236.
α-Amyradienyl acetate, oxidation of, 1196.
α-Amyradionyl acetate, 1198.
β-Amyranonyl acetate enol-acetate, 1512.
benzoate, 235.
***epi*(*iso*)-α-Amyrenonyl acetate**, 1197.
β-Amyrin benzoate, oxidation of, 230.
Analysis, microchemical, of gases, 1300.
qualitative, semimicro-, 1258, 1263.
Anhydrides, acid, aliphatic, physical properties of, 32.
Anhydrocellobiosazone, and its penta-acetyl derivative, 1480.
3:6-Anhydrogalactonic acid, methyl ester, 631.
3:6-Anhydrogalactose, properties of, 620.
3:6-Anhydrogalactose dimethylacetal, and its 2:4:5-tri-*p*-nitrobenzoyl derivative, 630.
3:6-Anhydro-α-methylgalactopyranoside, 624.
3:6-Anhydro-β-methylgalactopyranoside, 629.
Anhydromethylhexosides, 1479.
1-Anilinobenzthiazole, 193.
α-Anilinofumaric acid, α-*p*-amino-, acetyl derivative, ethyl ester, 1167.
Anions, toxic elements in, 252.
Anisole, 2-bromo-4-nitroso-, 2-fluoro-4-nitroso-, and 2-iodo-4-nitroso-, 812.
3-fluoro-4-amino-, -6-amino-, and its acetyl derivative, -4-nitroso-, and -6-nitroso-, 1270.
2-Anisoylanisic acid, and 5(or 3)-nitro-2-ω-3′-nitro-, 1097.
***p*-Anisoyl-2-hydroxy-1-naphthoylmethane**, 1500.
2-*p*-Anisoyloxy-1-acetonaphthone, 1499.
Anisoyloxydimethoxyacetophenones, 1372.
***p*-Anisoyl-*p*-toluoylmethane**, 250.
***p*-Anisyl *iso*cyano*di*chloride**, 193.
***p*-Anisyl α-bromo-*p*-methylstyryl ketone**, 250.
***p*-Anisyl αβ-*di*bromo-β-*p*-tolylethyl ketone**, 250.
***o*-Anisyl 6-hydroxy-2:3-benzostyryl ketone**, 818.
***o*-Anisyl 6-methoxy-2:3-benzostyryl ketone**, 818.
***p*-Anisyl *p*-methylstyryl ketone**, 250.
***p*-Anisyl-*p*-tolyl*iso*oxazoles**, 251.
Anisyltrimethoxyphenylacrylic anhydride, 200.
α-*p*-Anisyl-β-(3:4:5-trimethoxyphenyl)acrylic acid, and its esters, 199.
α-*p*-Anisyl-β-(3:4:5-trimethoxyphenyl)ethane, α-cyano-, 200.
α-*p*-Anisyl-β-(3:4:5-trimethoxyphenyl)ethylene, α-cyano-, 200.
α-*p*-Anisyl-β-(3:4:5-trimethoxyphenyl)propionic acid, and its *p*-phenylphenacyl ester, 200.
β-*p*-Anisyl-γ-(3:4:5-trimethoxyphenyl)propylamine, and its derivatives, 200.
Annual General Meeting, 479.
Anthranilic acid, 5-chloro-4-nitro-, methyl ester, 285.
Anthraquinone, 1:3:8-*tri*hydroxy-, and its acetyl derivative, 427.
Anthraquinone-1-carboxylic acid, 6-chloro-, 1475.
***N*-2-Anthrylauramine**, and its hydrochloride, 463.
Antimalarials, 314, 1164.
Antiplasmodial action and chemical constitution, 1307, 1315.
Arabic acid, constitution of, 74, 79, 1035.
Aromatic compounds, polycyclic, formation of, from unsaturated ketones, 636.
structure of, 446, 819.
***o*-Aroylacetoarones**, conversion of, into *o*-hydroxydiaroylmethanes, 1499.
Arsanthren *di*chloride, preparation of pure, 1188.
Arsenic, 3-covalent, stereochemistry of, 1184.
Aryl *iso*cyano*di*chlorides, reactions of, 191.
Arylamines, reaction of, with benzoins, 347.
Arylazo-bis-oximes, constitution of, 653.
Arylhydrazines, reaction of, with halogenated aldehydes, 813.
Arylhydrazones, nitro-, mol. wts. of, 166.
Aryl nuclei, union of, 1284.
Arylpyridines, 349, 355, 358, 1279.
Arylthiocarbimides, action of chlorine on, 191.
***dl*-Asparagine**, preparation of, 1489.
Aspartic acid, ethyl ester, and its derivatives, 1490.
***dl*-Aspartic acid**, preparation of, and its derivatives, 1489.
Aspidospermine from *Vallesia* species, 1051.
Atoms, report of Committee on, 1416.
Atomic weights, report of Committee on, 475.
table of, 478.
Atropic acid, methyl ester, action of Grignard reagents on, 840.
Auramine, derivatives of, 461.
Auramine dyes, *N*-substituted, absorption spectra of, 461.
Azo-dyes, aluminium lakes of, 603.
copper lakes of, 608.
vanadium lakes of, 1064.
Azo-groups as chelating group, 653.

B.

Bacteria, growth of, physical chemistry of, 1565, 1573.
Bacterium lactis ærogenes, effect of phenol on death rate of, 1573.
effect of toxic substances on growth, population, and fermentation of, 1565.
Beckeol, structure and synthesis of, 425.
synthesis of, 1208.
Balance sheets, 494.
Banana starch. See under Starch.
Barbituric acid, spectrum of, absorption ultra-violet, 1275.
Barium, determination of, volumetrically, with barium rhodizonate, 401.
Bases, aromatic, complex, formation of, with polynitro-compounds, 1539.
dissociation constants of, 1451.
Bassic acid, constitution of, and its derivatives, 713.
Benzaldehyde, reaction of, with acetophenone, 1295.
Benzaldehyde, *o*-bromo-, 2:4-*di*nitrophenylhydrazone, 449.
hydroxy-derivatives, absorption spectra of, 1351.
p-substituted derivatives, depolarisation potentials of, with dropping mercury cathode, 692.
Benzaldehydephenylmethylhydrazone, m.p. of, 170.
***p*-Benzamidoacetanilide**, and nitroso-, 368.
***p*-Benzamidophenylpyridines**, 373.
Benzanthracene photo-oxides, 1125.
1:2-Benzanthracene, 10-bromo-, and its picrate, 410.
1:2-Benz-10-anthraquinone, 410.
1:2-Benzanthranyl-10-acetaldehyde, and its derivatives, 411.
1:2-Benzanthranyl-10-acetic acid, α-hydroxy-, 411.
1:2-Benzanthranyl-10-glyoxylic acid, 411.
Benzanthrone, 6:13-*di*chloro-, and 13-chloro-6-amino-, 1475.
Benzanthrone, 13-halogeno-, nitration of, 1474.
5:6-Benz-4-carboline, 3-chloro-, 316.
3:10-*di*chloro-, 317.
Benzene, and chloro-, and nitro-, dielectric constants of, 894.

Benzene, 2:6-*di*chloro-, and 2:4:6-*tri*halogenonitro-, reactions of, with mercaptide reagent, 1525.
o-chloronitro-, and chloro-2:4-*di*nitro-, complex formation of, with diphenylamine, 1541.
1:2:3:4-*tetra*hydroxy-, derivatives of, 1092.
Benzeneazo-βγ-dichloro-Δ$^{\alpha}$-butylene, 2:4-*di*bromo-, 815.
Benzeneazo-β-naphthol, *o*-hydroxy-, aluminium derivatives of, 606.
vanadium derivatives, 1068.
Benzeneazo-α-naphthol-4-sulphonic acid, copper salt, 611.
Benzeneazo-β-naphthol-6-sulphonic acid, 2′-hydroxy-, vanadium derivative, 1069.
Benzeneazo-β-naphthylamine, 2′-hydroxy-, copper salts, 612.
vanadium derivatives, 1068.
Benzeneazoresorcinol, *o*-hydroxy-, vanadium derivative, 1068.
Benzenediazonium salts, *p*-hydroxy-, decomposition of, by alcohols, 1150.
Benzenesulphinic acid, potassium hydrogen salt, 862.
4-(Benzenesulphonamidobenzenesulphonyl)piperazine-1-carboxylic acid, 4-*p*-acetyl derivative, ethyl ester, 204.
2-Benzenesulphonamidopyridine, 3′-amino-4′-hydroxy-, 3′-nitro-4′-amino-, and its acetyl derivative, and 3′-nitro-4′-hydroxy-, 203.
1-Benzenesulphonylpiperazine, 1-*p*-amino-, 204.
4-Benzenesulphonylpiperazine-1-carboxylic acid, 4-*p*-amino-, and its acetyl derivative, ethyl esters, 204.
Benzhydryl chloride, hydrolysis of, in acetone, 920.
m-chloro-, halogen exchange between halide ions and, in sulphur dioxide solution, 1017.
halides, hydrolysis of, in aqueous acetone, 966.
nucleophilic substitution of, in sulphur dioxide solution, 1011.
3:4-Benzocoumarin, 7-hydroxy-, 1395.
5:6-Benzoflavylium chloride, 2′-hydroxy-, 818.
Benzoin, resolution of, 336.
Benzoins, reaction, of, with arylamines, 347.
d- and *l*-**Benzoins,** δ-(α-phenylpropyl)semicarbazones, 337.
Benzonitrile, 2-chloro-4-nitro-, 1523.
Benzonitriles, mobility of groups in, 1521.
p-**Benzoquinone,** detection of, colorimetrically, 1374.
4-oxime, 2-bromo-, 2-fluoro-, and 2-iodo-, derivatives of, 812.
p-**Benzoquinone,** *tetra*halogeno-derivatives, action of pyridine on, 1378.
o-**Benzoquinonebisphenylimines,** 4:2′- and 4:4′-*di*fluoro-4′- and -2′-hydroxy-, 207.
o-**Benzoquinone-1-phenylimine,** 4:2′-*di*fluoro-4′-hydroxy-, acetylation of, 206.
3:4-Benzo-1:2:10:11-tetrahydrofluorenone, 1327.
3:4-Benzo-1:2:10:11-tetrahydrofluorenone-1-carboxylic acid, 1326.
γ-Benzoylbutyric acid, 5-chloro-4-nitro-2-amino-, 2-acetyl derivative, 285.
γ-4-nitro-2-amino-, 2-acetyl derivative, 285.
Benzoylcholine iodide, 422.
6-Benzoylcoumarin-3-carboxylic acid, 5-hydroxy-, 247.
N-**Benzoyl-2:6′-dimethyldiphenylamine-2′-carboxylic acid,** and its methyl ester, 273.
N-**Benzoyldiphenylamine-2-carboxylic acid,** 4:6-*di*chloro-, and its methyl ester, 273.
N-**Benzoyl-4:4′-dipiperidyl** *per*chlorate, 1312.
Benzoyl-2-hydroxy-1-naphthoylmethane, 1500.
2-β-Benzoyl-α-2′-methoxy-1′-naphthylethyl*cyclo*hexanone, 2-β-*o*-hydroxy-, 818.
N-**Benzoyl-6-methyldiphenylamine-2-carboxylic acid,** and its methyl ester, 272.
N-**Benzoyl-6′-methyldiphenylamine-2′-carboxylic acid,** 2-chloro-, and its brucine salt and methyl ester, 274.
Benzoyl-β-naphthoylmethane, 250.
3-Benzoyloxycholestan-4-one 5:6-oxide, 63.
5-Benzoyloxytoluene, 2-hydroxy-, 330.
3:4-Benz-1-phenanthraldehyde, and its semicarbazone, 297.
3:4-Benz-2-phenanthraldehyde, and its semicarbazone, 1162.
3:4-Benzphenanthramides, 1160.
3:4-Benz-1-phenanthranilide, 297.
3:4-Benzphenanthrene, 1- and 2-alkyl derivatives of, 1159.
3:4-Benz-1-phenanthroic acid, ethyl ester, 1161.
3:4-Benz-2-phenanthroic acid, and its methyl ester, 297.
3:4-Benz-2-phenanthronitrile, 1161.
3:4-Benz-2-phenanthryldimethylcarbinol, 298.
Benzpinacol, action of potassium on, 251.
Benzyl radical in synthesis of methylated sugars, 453.
4-Benzylaminoazobenzene-4′-arsonic acid, 577.
r-**Benzyldeoxybenzoin,** and its 2:4-dinitrophenylhydrazone, 843.
ω-**Benzylideneacetophenone,** 4-chloro-, 1295.
4:6-Benzylidene 2- and 3-hydrazino-α-methylaltrosides, 321.
Benzylidenephthalimidine, 3-cyano-, and 1-imino-3-cyano-, 1078.
2-Benzylidene-α-tetralone, 638.
4-Benzyl-2-methylresorcinol, 247.
6-Benzyloxy-2-methoxyacetophenone, 1373.
Beryllium sulphate, hydrolysis of, 582.
NN′-**Bis-(5″-aminoamyl)benzidine,** and its tetrahydrochloride, 1319.
ωω′-**Bis-2′-amino-4′-thiazolylalkanes,** synthesis of, 1304.
1:4-Bis-2′-amino-4′-thiazolyl-*n*-butane, and its dihydrochloride, 1305.
1:10-Bis-2′-amino-4′-thiazolyl-*n*-decane, and its dihydrochloride, 1306.
1:6-Bis-2′-amino-4′-thiazolyl-*n*-hexane, and its dihydrochloride, 1305.
1:8-Bis-2′-amino-4′-thiazolyl-*n*-octane, and its dihydrochloride, 1306.
1:10-Bis*iso*amylaminodecane, and its dihydrochloride, 1320.
NN′-**Bis-(5″-benzamidoamyl)benzidine** di-*p*-toluenesulphonate, 1319.
Bis-(*p*-bromophenylthiocarbimide) oxide, 193.
1:4-Bischloroacetyl-*n*-butane, 1305.
1:6-Bischloroacetyl-*n*-hexane, 1305.
Bis-(βββ-*tri*chloro-α-hydroxyethyl) selenide and sulphide, 832.
1:4-Bisdiazoacetyl-*n*-butane, 1305.
1:1′-Bis-(β-diethylaminoethyl)dipiperidyls, and their tetrapicrate, 1319.
1:10-Bis-(γ-diethylaminopropylamino)decane, 1320.
1:6-Bis-(γ-diethylaminopropylamino)hexane, and its hydrobromide, 1320.
NN′-**Bis-(γ-diethylaminopropyl)benzidine,** and its tetrahydrobromide, 1319.
Bis-(*p*-dimethylaminophenyl)methane, action of nitrous acid on, 1288.
αα-Bis(ethylsulphonyl)propane, and its derivatives, 1564.
αα-Bis(ethylsulphonyl)propane, γ-chloro-, 1562.
γ-iodo-, 1563.
1:1-Bis(ethylsulphonyl)*cyclo*propane, 1563.
αα-Bis(ethylsulphonyl)-Δ$^{\alpha}$-propene, and γ-hydroxy-, 1551.
αα-Bis(ethylsulphonyl)-Δ$^{\beta}$-propene, γ-bromo-, 1563.
αβ-Bis(ethylsulphonyl)-Δ$^{\alpha}$-propene, 1556.
Bis(ethylsulphonyl)propionic acid, 1565.
αα-Bis(ethylthio)-β-*n*-butylthiopropane, 1558.
αα-Bis(ethylthio)propane, γ-chloro-, and γ-hydroxy-, 1551.

αα-Bis(ethylthio)-Δ^{α}- and -Δ^{β}-propene, 1551.
αβ-Bis(ethylthio)-Δ^{α}-propene, 1555.
***NN'*-Bisnitrosoacetylbenzidine**, 1383.
Bis-*NN'*-phenylcarbamyl-*ar*-octahydrodinaphthyline, 202.
Bis(phenylthiocarbimide) oxide, 193.
4:4'-Bis-(β-piperidino-α-hydroxyethyl)diphenyl, 1317.
Bis(propylphosphine)cadmium-mercury, *di*bromo*di*iodo-, 1234.
1:10-Bis-*p*-toluenesulphonylaminodecane, 1320.
1:6-Bis-*p*-toluenesulphonylaminohexane, 1319.
Bis(tolylthiocarbimide) oxides, 193.
Bis(tri-*n*-butylphosphine)-μ-di-iodocadmium-mercury, *di*iodo-, 1233.
Bis(tri-*n*-propylarsine)-μ-dibromopalladium-mercury, *di*bromo-, 1234.
Bis(tripropylphosphine)-μ-dibromocadmium-mercury, *di*bromo-, 1234.
Bis(tri-*n*-propylphosphine)-μ-di-iodocadmium-mercury, *di*iodo-, 1233.
Bis(tripropylphosphine)mercury, *di*iodo-, 1234.
Bordeaux extra, adsorption of, at mercury–water interfaces, 596.
Brein, and its derivatives, 798.
Bromine :—
Hydrobromic acid, addition of, to non-terminal double bonds, 68.
Butaldehyde, **αaββ-*tetra*chloro-**, *N*-acetyl-2:4-dibromophenylhydrazone, 816.
***n*-Butyl alcohol**, reaction of, with phosphorus chlorides and oxychloride, 1464.
***n*-Butyl** bromide, substitution of, with water and anions in formic acid solution, 940.
***tert.*-Butyl** bromide, hydrolysis of, in acetone, 913, 960.
in aqueous formic acid, 945.
in aqueous solution, 925.
olefin elimination from, 899.
chloride, substitution of, with water and anions in formic acid solution, 935.
α-*n*-Butyladipic acid, 640.
Butylaminoacetic acids, and their derivatives, 1292.
4-Butylaminoazobenzene-4'-arsonic acids, 577.
***sec.*-Butylaniline**, 576.
5-*n*-Butyl-1:2-benzanthracene, 304.
4-*sec.*-Butylcarbinylaminoazobenzene-4'-arsonic acid, 577.
***sec.*-Butylcarbinylaniline**, 576.
5-*n*-Butyl-7:8-dihydro-1:2-benzanthracene, 304.
2-*n*-Butyl*cyclo*pentanone, and its semicarbazone, 641.
***sec.*-Butylpyridinium ferrocyanide**, 229.
***n*-Butylquinolinium chloroplatinate**, 225.
α-*n*-Butylthiopropaldehyde, and its 2:4-dinitrophenylhydrazone, 1558.
Butyric acid, *d*-β-chloro-β-nitroso-, *l*-menthyl ester, circular dichroism and rotatory dispersion of, 784.
6-Butyrylcoumarin-3-carboxylic acid, 5-hydroxy-, 246.

C.

Cadmium halides, arsine and phosphine derivatives, 1209.
Calythrone, and its salts and derivatives, 412.
***d-iso*Camphane**, 347.
Camphor δ-(α-phenylethyl)- and δ-(α-phenylpropyl)-semicarbazones, 338.
Camphor, α-nitro-, mutarotation of, in chlorobenzene solution, 1202.
Cannabidiol from Egyptian hashish, and its bis-3:5-dinitrobenzoate, 649.
Cannabinol, structure of, 649.
synthesis of, 1393.
Cannabis indica, 649, 1118, 1121, 1393.
o-Carbamylbenzoylacetic acid, and its methyl ester, 1074.
β-*o*-Carbamylphenylpropionic acid, β-hydroxy-, 1075.
2-Carbamyl-1-thionaphthen, 3-hydroxy-, 327.
Carbanilide, chloronitroso-derivatives, 367.
nitroso-, 367.
α-Carbethoxy-γ-acetyl-α-phenylbutyric acid, ethyl ester, 849.
α-Carbethoxybenzyl chlorosulphinate, 228.
α-Carbethoxybenzylpyridinium ferrocyanide, 228.
α-Carbethoxyethyl *n*-butyl sulphite, 227.
carbonate, 230.
α-Carbethoxyethylquinolinium chloroplatinate, 225.
β-(α'-Carbethoxyethylthio)crotonic acid, ethyl ester, 1386.
α-(α'-Carbethoxyethylthio)ethylidenemalonic acid, ethy ester, 1386.
Carbethoxymethylenephthalimidine, 3-cyano-, 1078.
β-Carbethoxymethylthiocrotonic acid, ethyl ester, 1386.
5-Carbethoxy-2-phenyl-5-methyl*cyclo*hexanone-6-β-propionic acid, ethyl ester, 850.
Carbinolamines from naphthalene and quinoline, 1307.
α-Carbobenzyloxyamido-δ-ketohexoic acid, ε-chloro-, benzyl ester, 709.
Carbobenzyloxycystine, β-bromoethyl ester, 424.
Carbobenzyloxycystinyl choline iodide, 424.
Carbobenzyloxyphenylalanylcholine iodide, 425.
***N*-Carbobenzyloxythyronine**, 1103.
Carbohydrates, sulphuric esters of, 1475.
4-Carboline, derivatives of, 314.
Carbon atoms, saturated, substitution at, 913, 920, 923, 935, 940, 945, 949, 956, 960, 966, 971, 974, 979, 1011, 1017.
reaction of, with water vapour, 177.
rings, fused, 720, 727.
Carbon *tetra*chloride, adsorption of, 159.
dielectric constant of, 894.
***mono*xide**, preparation of, from carbonates, 213.
Carbonyl compounds, condensations of, 1295.
***N*-γ-(*o*-Carboxybenzamido)propylanilinesulphonic acid**, 691.
***o*-Carboxybenzeneazo-β-naphthol**, vanadyl complex, 1068.
2'-Carboxybenzeneazo-α-naphthol-4-sulphonic acid, cupric salts, 611.
2'-Carboxybenzeneazo-β-naphthylamine, copper salts, 612.
6-Carboxy-3:4-dimethoxyphenylpropionic acid, αβ-*di*bromo-, 1209.
Carboxyl ions, polar effect of, 956.
3-Carboxymethylenephthalimidine, methyl ester, 1074.
2-Carboxyphenylthiolacetamide, 326.
Carenes, condensation of, with maleic anhydride, 702.
Catalysis, acid, in non-aqueous solvents, 1202.
by metallic chlorides, of styrene polymerisation, 775.
Catalysts, platinum, poisoning of, by metals, 469.
hydrogenation, preparation of, 1130.
Catalytic dehydrogenation, elimination of methyl groups in, 1127.
toxicity. See under Toxicity.
Cellobiosazone, derivatives of, 1479.
Chabazite, adsorption by, 164.
Chalkones, 247, 817.
Charcoal, sugar, adsorption by, 159.
Chelation in potassium salts of carboxylic and sulphinic acids, 859.
Chemotherapeuticals, lipophilic, synthesis of, 576.
Chloral cyanohydrin, phenylurethane, action of alkalis on, 1512.
Chlorine, photo-expansion of, 394.
reaction of, with nitric oxide, inhibition of, 823.
Chloroform, adsorption of, on chromic oxide, 19, 162.
dielectric constant of, 894.

Chlorosulphinic acid, esters, 218.
decomposition of, 463.
Chlorosulphonic acid, esters, 218.
$\Delta^{4:6}$-Cholestadien-3(β)-ol, preparation of, 66.
$\Delta^{2:5}$-Cholestadien-3-ol-4-onyl-6:6′-($\Delta^{4':6'}$-cholestadien-4′-ol-3′-one), and its derivatives, 65.
$\Delta^{4:6}$-Cholestadien-3-one 2:4-*di*nitrophenylhydrazone, 67.
Cholestane-3:4-dione, and its derivatives, 64.
***epi*Cholestanol**, 1392.
Cholestanyl phenylurethane, 1487.
Δ^{5}-Cholestene-3:4-diones, and their derivatives, 63.
***epi*Cholesteryl** benzoate, 1392.
4-Cholesterylaminoazobenzene-4′-arsonic acid, 577.
Choline, esters of, and their oxytocic activity, 419.
***d-iso*Chondrodendrine**, salts, 745.
Chondrodendron candidans, *microphyllum*, and *platyphyllum*, alkaloids from, 737.
Chondrofoline, and its salts, 742.
Chromium :—
Chromic oxide, adsorption by, of chloroform, 19, 162.
Chromones of naphthalene series, 1499.
2-Cinnamoyloxy-4-methoxyacetophenone, 1500.
Cinnamyl alcohol, action of, with ethyl acetoacetate, 1266.
Claisen's condensation, mechanism of, 216.
Coal, composition of, and its extraction with quinoline, 866.
***d-iso*Coclaurine**, and its hydrochloride, 744.
Colchicine, and its derivatives, 194, 198.
Colchinol methyl ether, carbinol from, and its derivatives, 197.
Congo-red, adsorption of, at mercury–water interfaces, 596.
Constitution, and antiplasmodial action, 1307, 1315.
and physical properties, 171, 1528.
Copper lakes of azo-dyes, 608.
Crotonaldehyde, $\alpha\beta$-*di*chloro-, 2:4-*di*bromo-, and 2:4-*di*chloro-phenylhydrazones, and their acetyl derivatives, 816.
Crotonic acid, addition of hydrogen bromide to, 68.
Crotonylideneacetone semicarbazone, 641.
Crotonylidene*cyclo*pentanone semicarbazone, 640.
Curare alkaloids, 737.
***dl-α*-Curcumene**, synthesis of, and its nitrosate, 451.
Cyano-esters, saturated and unsaturated, 1528.
Cyanogen :—
Hydrocyanic acid, studies on, 407.
tetrapolymer of, 1206.
Cysteyl choline iodide hydriodide, 424.

D.

Deamination, 207.
***trans*-Decalin-2:3-diol**, 726.
Dehydro-β-amyrenol, and its benzoate, 236.
Dehydrobassic acid, methyl ester, and its derivatives, 717.
Dehydrogenation, 1127, 1134, 1139.
Dehydromalaccol, 313.
Dehydro-α-zymostenol, 1489.
Deoxyquillaic acid, and its derivatives, 616.
Derris malaccensis, constituents of, 1178.
malaccol from, 309.
3:4-Diacetoxy-$\Delta^{2:5}$-cholestadiene, 64.
4:4′-Diacetyldiphenyl, 4:4′-*di*-ω-chloro-, 1317.
Diacetyl-2:6-naphthylenediamine, 382.
$\alpha\beta$-Diacetylphenyl-o-tolylhydrazine, 335.
Diacetyltartaric acid, ethyl ester, rotation of, in various solvents, 291.
***m*-Dialkylaminobenzaldehydes**, condensation products of, with reactive methylene groups, 57.
3-Diallylamino-α-4′-nitrophenylcinnamonitrile, 58.
Diamylaminomethoxy-6-methoxy-4-quinolylcarbinols, and their dipicrates, 1313.
Diamylaminomethyl-4-quinolylcarbinol *di*picrate, 1312.
αa-Dianisylacetic acid, preparation of, 834.
$\alpha\beta$-Di-*p*-anisylbutane, $\alpha\beta$-*di*hydroxy-, preparation of, 834.
αa-Dianisyl-β-butanone, preparation of, 834.
αa-Dianisyl-α-ethylacetaldehyde, preparation of, 834.
αa-Dianisyl-β-ethylbutane, β-hydroxy-, preparation of, 835.
Diaryls, asymmetrical, preparation of, 208.
Diazo-groups, replacement of, by hydrogen, 207.
1:4-Dibenzenesulphonylpiperazine, 1:4-*di*-*p*-amino-, and its acetyl derivative, 204.
Dibenzoyl-4:4′-dipiperidyl, 1312.
Dibenzoyldisulphone, 832.
Dibenzpyran derivatives, synthesis of, 1118.
Dibenzyl *di*sulphide, reaction of, with sulphuryl chloride, 641.
3′-Dibenzylaminostilbene, 2:4-*di*nitro-, 58.
2:3-Dibenzyl 4:6-benzylidene β-methylgalactoside, 1148.
2:3-Dibenzyl 4:6-benzylidene α-methylglucoside, 454.
2:3-Dibenzyl 4:6-dimethyl β-methylgalactoside, 1148.
2:3-Dibenzyl 4:6-dimethyl α-methylglucoside, 455.
Dibenzylmethylcarbinol, 821.
2:3-Dibenzyl β-methylgalactose, 1148.
2:3-Dibenzyl α-methylglucoside, 454.
***l*-Dibornyl**, 347.
Di-*n*-butoxyphosphorus chloride, 1466.
Di-*n*-butoxyphosphoryl chloride, 1466.
Dibutylaminomethyl-6-methoxy-4-quinolylcarbinol, and its salts, 1313.
3-Dicarbethoxymethylenephthalimidine, 1074, 1079.
3-Dicarbethoxymethylenephthalimidine, 1-imino-, hydrochloride, 1078.
Di-(β-diethylaminoethyl)carbobenzyloxycystine *di*methiodide, 423.
Dielectric constants and polarisation of alcohols, 888.
Dienes, conjugated, spectra of, absorption, effect of molecular environment on, 1453.
Diethanolaminomethyl-1-naphthylcarbinol picrate, 1310.
2:5-Diethoxy-5′-methyldiphenyl, 2′-cyano-, 1120.
Diethyl *n*-butyl phosphate, 1467.
N^4-Diethylaminoalkyl-N^1-dialkylsulphanilamides, 686.
***N*-β-Diethylaminoethylacetanilide**, 691.
***N*^{4}-β-Diethylaminoethyl-*N*^{4}-acetyl-*N*^{1}-dimethylsulphanilamide**, 688.
3-β-Diethylaminoethylamino-5:6-benz-4-carboline, and its dihydrobromide, 316.
3-β-Diethylaminoethylamino-1:4-dimethylcarbolinium *di*salicylate, 316.
3-β-Diethylaminoethylamino-1-methyl-5:6-benz-4-carboline *di*hydrochloride, 317.
β-Diethylaminoethylaminomethyl-5:6:3′:2′-pyridoquinolines, and their salts, 1166.
2-β-Diethylaminoethylamino-4-methylquinoline, 6-nitro-, and its salts, 1167.
4-β-Diethylaminoethylamino-5:6:3′:2′-pyridoquinoline, 1168.
***N*-β-Diethylaminoethylaniline**, 691.
***N*^{4}-β-Diethylaminoethyl-*N*^{1}-diethylsulphanilamide**, and its hydrochloride, 689.
***N*^{4}-β-Diethylaminoethyl-*N*^{1}-dimethylsulphanilamide**, and its hydrochloride, 689.
***N*-β-Diethylaminoethylformanilide**, 691.
***N*^{4}-β-Diethylaminoethyl-*N*^{1}-pentamethylenesulphanilamide**, and its hydrochloride, 689.
1:12-Diethylamino-2:11-*di*hydroxydecane, and its dipicrate, 1318.

Diethylaminomethyl-6-methoxy-4-quinolylcarbinol *di*hydrochloride, 1313.
Diethylaminomethyl-1-naphthylcarbinol, and its picrate, 1310.
Diethylaminomethyl-4-quinolylcarbinol *di*picrate, 1312.
3-Diethylamino-α-4′-nitrophenylcinnamic acid, 58.
3-Diethylamino-α-4′-nitrophenylcinnamonitrile, 58.
γ-Diethylaminopropyl chloride, b.p. of, 1320.
3-γ-Diethylaminopropylamino-1:4-dimethylcarbolinium *di*salicylate, 316.
2-γ-Diethylaminopropylamino-4-methyl-5:6:3′:2′-pyridoquinoline, and its hydrobromide, 1166.
4-γ-Diethylaminopropylamino-5:6:3′:2′-pyridoquinoline, and its picrate, 1168.
N^4-γ-Diethylaminopropyl-N^1-diethylsulphanilamide, 690.
1-γ-Diethylaminopropyltetrahydroquinoline, and its dipicrate, 1319.
3′-Diethylaminostilbene, 4-nitro-, 58.
2 : 4-*di*nitro-, 58.
2-*m*-Diethylaminostyrylbenzthiazole methiodide, 59.
2-*m*-Diethylaminostyrylpyridine methiodide, 59.
Di-*n*-heptylamine, preparation of, 1314.
Di-*n*-heptylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dipicrate, 1314.
Di-*n*-heptylbenzylamine, 1314.
Di-$\Delta^{1:1}$-*cyclo*hexene, spectrum of, absorption, 1462.
Di-*n*-hexylamine, and its derivatives, 1314.
Di-*n*-hexylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dipicrate, 1314.
Di-*n*-hexylbenzylamine, 1313.
1:2-Dihydro-3:4-benz-1-phenanthroic acid, 298.
1:2-Dihydro-1:2-dimethylchrysene, 301.
Dihydro-α- and -β-dunniones, diacetyl derivatives, 1496.
Dihydro*allo*dunnione, and its diacetyl derivative, 1498.
Dihydrohydroxyhydro*iso*dunniol, tetra-acetyl derivative, 1497.
Dihydrohydroxyhydro*allo*dunnione, 1498.
α- and β-Dihydromiropinic acids, 685.
Dihydropentindole, 7-chloro-4-nitro-, 285.
Dihydropolyporenic acid A, and its derivatives, 1492.
Dihydropterocarpin, oxidation of, 793.
Dihydrosarcostin, and its triacetate, 1445.
2:11-Diketododecane, 1:12-*di*chloro-, 1318.
α-Diketones, steroid, 60.
2:13-Diketotetradecane, 1318.
2:13-Diketotetradecane, 1:14-*di*chloro-, 1318.
***l*-Dimenthyl, 347.**
2:5-Dimethoxy-*n*-amylbenzene, 1120.
αβ-Di-3-methoxybenzylsuccinic acids, αβ-*di*-4-hydroxy-, and their derivatives, 1100.
βγ-Dimethoxy-αα-bis(ethylthio)propane, 1563.
6:7-Dimethoxycarbostyril, 1209.
3:4-Dimethoxycinnamic acid, 6-cyano-, 1209.
4:4′-Dimethoxy-αα′-diethylstilbene, synthesis of, 833.
2′:6′-Dimethoxy-4′:5-dimethylazobenzene, 2-cyano-, 1121.
Dimethoxyflavones, hydroxy-, 1373.
2:5-Dimethoxy-5′-methyl-4-*n*-amyldiphenyl, 2′-cyano-, 1121.
4:6-Dimethoxy-3-methyl*iso*butyrophenone, 2-hydroxy-, and its acetyl derivative, 1208.
2:5-Dimethoxy-5′-methyldiphenyl, 2′-cyano-, 1120.
2′:4′-Dimethoxyphenyl-Δ^1-*cyclo*hexene-2-carboxylic acid, and its ethyl ester, 1395.
αβ-Dimethoxypropaldehyde diethylacetal, 1563.
Dimethoxyquaterphenyls, 1381, 1384.
4:4′-Dimethoxystilbenediol *di*acetate, 1328.
3:4-Dimethoxystyrene, ω-bromo-6-cyano-, 1209.
***cis*-ω-bromo-6-cyano-, 1209.**
9:10-Dimethoxy-1:2:9:10-tetramethyl-9:10-dihydroanthracene, 18.
9:10-Dimethoxy-5:6:9:10-tetramethyl-9:10-dihydro-1:2-benzanthracene, 18.
9:10-Dimethoxy-6:9:10-trimethyl-9:10-dihydro-1:2-benzanthracene, 17.
4-Dimethylamino-4′-acetamidoazobenzene, 368.
4-Dimethylaminoazobenzene-4′-arsonic acid, 577.
Dimethylaminomethyl-1-naphthylcarbinol, 1310.
3-Dimethylamino-α-4′-nitrophenylcinnamic acid, 58.
3-Dimethylamino-α-4′-nitrophenylcinnamonitrile, 58.
3′-Dimethylaminostilbene, 4-nitro-, 58.
2:4-*di*nitro-, 57.
2-*m*-Dimethylaminostyrylbenzthiazole methiodide, 59.
2-*m*-Dimethylaminostyrylpyridine methiodide, 59.
2-*m*-Dimethylaminostyrylquinoline methiodide, 59.
2-*m*-Dimethylaminostyrylthiazole methiodide, 59.
2:4-Dimethyl 3:6-anhydrogalactonic acid, and its methyl ester, 625.
2:4-Dimethyl 3:6-anhydrogalactonolactone, 625.
2:4-Dimethyl 3:6-anhydrogalactose anilide, 625.
2:4-Dimethyl 3:6-anhydrogalactose dimethylacetal, and its 5-*p*-nitrobenzoyl derivative, 626.
2:4-Dimethyl 3:6-anhydro-α-methylaltroside, 322.
2:4-Dimethyl 3:6-anhydro-α- and -β-methylgalactopyranosides, 624.
Dimethylaniline, *p*-nitro-, action of nitrous acid on, in hydrochloric acid, 138.
1:2-Dimethylanthracene, 18.
5:7-Dimethyl-1:2-benzanthracene, 639.
6:10-Dimethyl-1:2-benzanthracene, 10-hydroxy-, and its acetyl derivative, 412.
9:10-Dimethyl-1:2-benzanthracene photo-oxide, 1126.
5:6-Dimethyl-1:2-benzanthraquinone, preparation of, 17.
***pp′*-Dimethylbenzhydryl chloride, hydrolysis of, in aqueous acetone, 974.**
***pp′*-Dimethylbenzhydrylamine, and its salts, 978.**
2-(2′:3′-Dimethylbenzoyl)benzoic acid, 18.
2-(2′:3′-Dimethylbenzoyl)-1-naphthoic acid, 17.
βγ-Dimethylbutadiene, polymerides of, 1169.
4:4′-Dimethylcarbanilide, nitroso-, 367.
1:2-Dimethylchrysene, and its 1:2-oxide, 300.
1:2-Dimethylchrysene-7-carboxylic acid, 300.
1:9-Dimethyl-1-decalol, 1131.
9:19-Dimethyl-1:2:5:6-dibenzanthracene photo-oxide, 1126.
5:7-Dimethyl-*x*:*x*′-dihydro-1:2-benzanthracenes, 638.
1:2-Dimethyl-1:2-dihydrochrysene, 1:2-*di*hydroxy-, 300.
***as*-1:1′-(2:2′-Dimethyldinaphthyl)ethane, 298.**
4:6-Dimethyl galactose, synthesis of, 1147.
4:6-Dimethyl glucose, 453.
2:3-Dimethyl-Δ^2-*cyclo*hexenone, preparation of, 416.
1:2-Dimethyl*cyclo*hexylacetic acid, synthesis of, and its derivatives, 415.
1:2-Dimethyl*cyclo*hexylacetic acid, 6-hydroxy-, lactone, 417.
2:3-Dimethylindole, 4-amino-, and 7-chloro-4-nitro-, 285.
Dimethylmaleic anhydride, and its derivatives, 414.
2:3-Dimethyl β-methylgalactofuranoside, amide, 1112.
2:3-Dimethyl β-methylgalactopyranoside, methyl ester, 1509.
4:6-Dimethyl β-methylgalactoside, 1149.
4:6-Dimethyl α-methylglucoside, and its 2:3-di-*p*-toluenesulphonyl derivative, 455.
2:3-Dimethyl methylglycuronoside, and its derivatives, 1043.
2:3-Dimethyl mucic acid, derivatives of, 1112.
1:6-Dimethylnaphthalene, synthesis of, 1239.
3:4-Dimethylnaphthalene, 1-bromo-, and its picrate, 299.
3:4-Dimethyl-1-naphthylacetic acid, 299.
α-1-(3:4-Dimethylnaphthyl)-*o*-aminocinnamic acid, 300.

β-1-(3:4-Dimethylnaphthyl)ethyl alcohol, and its chloride, 299.
α-1-(3:4-Dimethylnaphthyl)-*o*-nitrocinnamic acid, 300.
***cis*-1:9-Dimethyloctalin**, 1131.
3:3-Dimethylphthalimidine, and its 2-acetyl derivative, 1088.
ββ-Dimethylpropionic acid, α-cyano-, ethyl ester, refractive index of, 1528.
4:8-Dimethyl-6-propylcoumarin, 7-hydroxy-, 246.
2:3-Dimethyl γ-saccharic acid, derivatives of, 1044.
N^1-Dimethylsulphanilamide, 688.
2:2-Dimethyl-3′:4′:5′:6-tetrahydrodibenzpyran, 4″-hydroxy-, and its acetyl derivative, and 5″-hydroxy-, 1124.
1:6-Dimethyl-5:6:7:8-tetrahydronaphthalene, 1242.
1:6-Dimethyltetralone 2:4-*di*nitrophenylhydrazone, 1242.
2:4-Dimethylthiophen-3-carboxylic acid, 5-hydroxy-, 1386.
Dimethyl-*p*-toluidine, action of nitrous acid on, 1289.
2:8-Dimethyl-2-(4′:8′:12′-trimethyltridecyl)chroman, 6-hydroxy-, 330.
2:5-Dimethyltriphenylcarbinol, 1245.
2:5-Dimethyltriphenylmethane, 1246.
2:5-Dimethyltriphenylmethyl chloride, 1246.
*per*oxide, 1248.
Dimethyl xylonolactone, 1505.
Dinaphthoylmethanes, 2-hydroxy-, 1500.
Dinaphthyline, preparation of, 201.
1:3-Di-α-naphthyl-2-methylpropylene, 821.
1:3-Di-β-naphthyl-2-methylpropylene, 821.
Diosphenols, steroid, 60.
Diphenyl, bromonitro-derivatives, 449.
3:4′-*di*nitro-, 211, 474.
4′-nitro-2-hydroxy-, 2-acetyl derivative, 1384.
3-nitrosoamino-, acetyl derivative, 371.
Diphenyl series, 208.
Diphenylamine, complex formation of, with chloronitrobenzenes, 1541.
2:3-Diphenyl-5:6-benzquinoxaline, 3′-amino-, 386.
Diphenylbenzylcarbinol, *di*-*p*-bromo-, and *di*-*p*-iodo-, 1328.
Diphenyl-*o*-bromophenyl*iso*oxazole, 449.
Diphenyl-4:4′-dicarboxylic acid, and its chloride, 1317.
Diphenyl-*p*-diphenylylcarbinol, preparation of, 878.
1:3-Diphenyl-2-methylpropylene, 821.
2:7-Diphenylnaphthalene, 382.
Diphenyl-α-naphthylcarbinol, preparation of, 878.
αα-Diphenyl-β-phenylbromoethylene, αα-*di*-*p*-bromo-, αα-*di*-*p*-chloro-, and αα-*di*-*p*-iodo-, 1328.
αα-Diphenyl-β-phenylethylene, αα-*di*-*p*-bromo- and αα-*di*-*p*-iodo-, 1328.
1:2-Diphenyl-5-pyrrolidone, 2-hydroxy-, and 2-hydroxy-1-*p*-bromo-, 441.
Diphenyl-*o*-tolylacetic acid, and its derivatives, 885.
Diphenyl-*o*-tolylcarbinol, preparation of, 885.
Diphenyl-*o*-tolylmethane, preparation of, 885.
Diphenyl-*o*-tolylmethyl, radical stability of, 887.
Diphenyl-*o*-tolylmethyl *per*oxide, 885.
Diphenyl-*m*-tolylmethyl chloride, 1246.
peroxide, 1248.
γ-4-Diphenylbutyric acid, 1030.
4-Diphenylylpiperidinomethylcarbinol, and its derivatives, 1317.
1:14-Dipiperidino-2:13-diketotetradecane, 1318.
1:14-Dipiperidino-2:13-*di*hydroxy-2:13-dipropyltetradecane, 1318.
1:12-Dipiperidino-2:11-*di*hydroxydodecane, and its dipicrate, 1318.
Dipole moments, measurement of, solvent effect in, 752, 888.
Dipropylaminomethyl-1-naphthylcarbinol picrate, 1310.
Dipropylaminomethyl-4-quinolylcarbinol *di*picrate, 1312.
3-Dipropylamino-α-4′-nitrophenylcinnamic acid, 59.
3-Dipropylamino-α-4′-nitrophenylcinnamonitrile, 58.
3′-Dipropylaminostilbene, 4-nitro-, 59.
2:4-*di*nitro-, 58.
2-*m*-Dipropylaminostyrylpyridine methiodide, 59.
Dipyridylcadmium, *di*bromo- and *di*iodo-, 1217.
Dissociation constants, in relation to activation energies and resonance, 1447.
measurement of, by conductivity titrations, 84.
of salts in water, 87.
thermodynamic, of dibasic acids, 855.
Dithiobenzoyl oxide, 832.
Dithiodiglycollylcholine iodide, 422.
2:3-Di-*p*-toluenesulphonyl 4:6-benzylidene α-methylaltroside, 321.
2:6-Di-*p*-toluenesulphonylnitrobenzene, and 4-bromo-, and 4-chloro-, 1527.
αγ-Di-*p*-toluoylpropane, 452.
α- and **β-5:10-Di-*p*-tolyl-l5:10-dihydroarsanthren**, preparation and isolation of, and their derivatives, 1189.
2:6-Di-*o*-tolylidene*cyclo*hexanone, 638.
3:5-Di-(*p*-tolylthio)acetanilide, 2- and 4-nitro-, 1527.
3:5-Di-(*p*-tolylthio)aniline, 2- and 4-nitro-, 1528.
2:6-Di-*p*-tolylthionitrobenzene, and 4-bromo-, and 4-chloro-, 1527.
4:6-Di-(*p*-tolylthio)nitrobenzene, 2-chloro-, 1528.
2:3-Ditosyl 4:6-benzylidene β-methylgalactoside, 1149.
2:3-Ditosyl 4:6-dimethyl β-methylgalactoside, 1149.
Ditosyl α-methylgalactopyranoside, 624.
2:3-Ditosyl β-methylgalactoside, 1149.
***n*-Dodecyl alcohol**, action of, on α- and β-naphthylamine hydrochlorides, 388.
4-*n*-Dodecylaminoazobenzene-4′-arsonic acid, 577.
Dodecylaniline, 576.
***N*-Dodecyl-β-naphthylamine**, 389.
Duboisia myoporoides, alkaloids of, 1155.
***iso*Dunniol**, 1498.
Dunnione, 1493.
β-*iso*Dunnione, bromo-, 1497.
α- and **β-*iso*Dunniones**, and their derivatives, 1496.
***allo*Dunnionesulphonic acid**, 1498.
Dyes, adsorption of, at mercury–water interfaces, 596.

E.

Echinocystic acid, relation of, to quillaic acid, 612.
Electrolytic oxidation, 256.
Elemi resin, See under Resins.
Emodin, *Frangula*-, oxidation of, 427.
Emulsions, stabilisation of, 1513.
water-in-oil, 211.
Ephedrines, nitroso-, 1154.
Epimerisation, 1390.
αβ-Epoxy-αα-bis(ethylsulphonyl)propane, 1552.
***epineo*Ergosterol**, 1392.
Erythrophleic acid, and its derivatives, 288.
Erythrophleine, and its sulphtae, 286.
Erythrophleum alkaloids, 286.
γ-Ethoxy-αα-bis(ethylsulphonyl)propane, 1551, 1562.
γ-Ethoxy-αα-bis(ethylthio)propane, 1551.
5-Ethoxy-2:4-dimethylthiophen-3-carboxylic acid, 1386.
1-(Ethoxy-2′-methoxy-1′-naphthylmethyl)coumaran-2-one, 1-bromo-, 819.
5-Ethoxy-2-methyl-4-ethylthiophen-3-carboxylic acid 1386.
5-Ethoxy-2-methylthiophen, 1386.
γ-4-Ethoxyphenylpyridine, 356.
3-Ethoxythiophen-5-acetic acid, ethyl ester, 1387.
Ethyl alcohol, dielectric constant of, 894.

Ethyl bromide, hydrolysis of, in aqueous formic acid, 945.
in aqueous solution, 925.
olefin elimination from, 899.
carbonate, action of sodium on, 216.
Ethyl ether, ignition of, mixed with oxygen, 143, 151.
4-Ethylaminoazobenzene-4′-arsonic acid, 577.
α-Ethylaminopropionic acid, and its benzenesulphonyl derivative, 1293.
***p*-Ethylbenzaldehyde**, preparation of, 701.
10-Ethyl-1:2-benzanthracene, 10-β-hydroxy-, 411.
Ethyl-3:4-benzphenanthrenes, and their picrates, 1160.
5-Ethyl-7:8-dihydro-1:2-benzanthracene, 304.
Ethylene glycol, reaction of, with lead tetra-acetate, 82.
N^4-5′-Ethyl-4′-methyl-2′-thiazolylsulphanilamide, 5′-β-hydroxy-, 1307.
Ethylquinolinium chlorosulphinate, 226.
N^4-Ethylsulphanilamide, 690.
N^1-Ethylsulphanilamidoacetic acid, ethyl and methyl esters, 1576.
α-Ethylsulphonyl-β-*n*-butylsulphonyl-Δ^{α}-propene, 1558.
Ethylthiol, reaction of, with α-bromopropaldehyde diethylacetal, 1553.
β-Ethylthiopropaldehyde, 1562.
α- and β-Ethylthiopropaldehydes, and their derivatives, 1557.
α-Ethylthio-Δ^{β}-propene, γ-chloro-, 1553.
Eucalyptus oil, carbonyl constituents of, 808.
Eucarvone, 2:4-*di*nitrophenylhydrazone, 1163.
reaction of, with maleic anhydride, 1162.
Eudaline, derivatives of, 1145.
Expansion coefficient, thermal, relation of, to structure of solutions, 870.

F.

Faraday Lecture, 511.
Films, *uni*molecular, on solids, 511, 773.
on water, ageing of, 128.
solubility and surface pressure of, 114.
water evaporation through, 106.
Fish, plants poisonous to, 309, 1178.
Flames, "cool," in relation to normal flames, 143, 151.
Flavone, 5:6:4′-*tri*hydroxy-, 1374.
Flavones, *tri*hydroxy-, derivatives of, 1370.
Fluids, adsorption at interface between, 596.
Fluorene, 2-amino-, 2-*p*-toluenesulphonyl derivative, 3:7-*di*bromo-, 3:7-*di*bromo-2-amino-, and 2-bromo-3-nitro-, and their derivatives, 449.
Formaldehyde, action of nitrous acid on, 142.
Formamide, refractivity of, 869.
Formic acid, action of, on triphenylmethyl chloride and ethyl ether, 1333.
esters, stability of, 874.
3-Formylbenzophenone, 2:4-*di*hydroxy-, and its 2:4-dinitrophenylhydrazone, 246.
3-Formylbutyrophenone, 2:4-*di*hydroxy-, and its semicarbazone, 246.
N^4-Formyl-N^4-ethylsulphanilamide, 690.
3-Formylphenyl benzyl ketone, 2:4-*di*hydroxy-, and its derivatives, 247.
3-Formylpropiophenone, 2:4-*di*hydroxy-, and its 2:4-dinitrophenylhydrazone, 246.
***Frangula*-emodin**. See under Emodin.
Fructose methylphenylhydrazone, 1511.
Fuller's herb. See *Saponaria officinalis*.
Fungi, higher, constituents of, 632, 1491.

G.

Galactosazone, derivatives of, 1479.
Galactose sulphates, 1475.
3-Galactosidogalactose from arabic acid, 79.
Gases, adsorption of, by solids, 156.
micro-analysis of, 1300.
Gentiobiosazone hepta-acetate, 1481.
***dl*-Δ^3-*cyclo*Geranic acid**, resolution of, 418.
Geraniol, action of ethyl acetoacetate on, 704.
Ginkgetin, structure of, 1370.
Glucosaminides, structure of, 29.
Glucose sulphates, 1475.
Glucosides from *cyclo*hexane series alcohols, 243.
Glutamic acid series, 706.
Glutaric acid, thermodynamic dissociation constants of, 858.
Glycerol, phosphorylation of, 752.
Glycylcholine chloride hydrochloride, 421.
Glycylglycylcholine chloride hydrochloride, 421.
Glyoxime *NN′*-bis-3-bromo-, -3-fluoro-, and -3-iodo-4-methoxyphenyl ethers, 412.
Gold compounds, 4-covalent, stability of, 1235.
Gomberg reaction, modified, 1284.
Guanosine 3- and 5-phosphates, synthesis of, 746.
Guanylic acid, synthesis of, 746.
Gypsogenic acid, and its derivatives, 619.
Gypsogenin, 619.

H.

Hashish, Egyptian, cannabidiol from, 652.
Heat of dissociation, and structure of salt deuterates and hydrates, 72.
Heptamethyl aldobionic acid, methyl ester, from hydrolysis of methylated arabic acid, 74.
4-*n*-Heptylaminoazobenzene-4′-arsonic acid, 577.
5-*n*-Heptyl-1:2-benzanthracene, 304.
Heptylbenzylamine, and its hydrochloride, 1314.
5-*n*-Heptyl-7:8-dihydro-1:2-benzanthracene, 304.
Heterocyclic compounds, nitrogenous, spectra of, absorption ultra-violet, 1275.
$\Delta^{2:4}$-Hexadiene, spectrum of, absorption, 1461.
Hexahydrocuminic acid, α-bromo-, and its ethyl ester, 809.
Hexahydronaphthalene, 727.
Hexamethyl 6-β-glycuronosidogalactose, 74.
Hexamethyl 6-β-glycuronosido-β-methylgalactopyranoside, amide of, 78.
Hexamethylnaphthidineammonium *di*iodide, 202.
***cyclo*Hexane series**, alcohols of, 243, 280.
***cyclo*Hexanone**, 4-hydroxy-, and its acetyl derivative, 13.
3:4-*cyclo*Hexenocoumarin, 6-hydroxy-, and its acetyl derivative, and 7-hydroxy-, acetyl derivative, 1123.
***cyclo*Hexyl alcohols**, epimeric, parachors of, 280.
***n*-Hexylaminoacetic acid**, benzenesulphonyl derivative, 1294.
4-*n*-Hexylaminoazobenzene-4′-arsonic acid, 577.
4-*cyclo*Hexylaminoazobenzene-4′-arsonic acid, 577.
5-*n*-Hexyl-1:2-benzanthracene, 304.
***n*-Hexylbenzylamine**, and its hydrochloride, 1313.
5-*n*-Hexyl-7:8-dihydro-1:2-benzanthracene, 304.
***cyclo*Hexylidenacetaldehyde**, preparation of, 14.
Homopterocarpin, 787.
Hormones, pituitary, posterior, oxytocic, chemistry of, 419.
sex, substances of type of, 721, 727.
Hydrazides, acid, association of, 332.
Hydrazine, determination of, potentiometrically, in alkaline solution, 673.
Hydrobromic acid. See under Bromine.
Hydrocarbons, aromatic, complex formation of, with polynitro-compounds, 1539.
polycyclic, 16, 293, 303, 1125, 1159, 1396.
optically active, saturated, solvent effects with, 345.
Hydrocyanic acid. See under Cyanogen.
Hydro*iso*dunniol, hydroxy-, 1497.

Hydrogen atoms, associating effect of, 166, 332.
reaction of, with oxygen, sensitised by nitrous oxide, 464.
replacement of diazo-groups by, 207.
Hydrogen bridge, effect of solvent on strength of, 850.
Hydrolysis of salts in solution, 578.
Hydronaphthalenes, catalytic dehydrogenation of alcohols and ketones from, 1134.
Hydroxides, precipitation of, electrometric studies of, 758, 761.
Hydroxy-aldehydes, spectra of, absorption, and of their methyl ethers, 1347.
Hydroxy-ketones, spectra of, absorption, and of their methyl ethers, 1347.
Hydroxylamine, determination of, potentiometrically, in alkaline solution, 673.
Hydroxyl groups, replacement of, by chlorine atoms, 218.
o-**Hydroxy-sulphones**, rearrangement of, and its reversibility, 442.

I.

2-Imino-5-methylthiazolidine, resolution of, and its salts, 338.
Iminophthalimidine, condensations of, 1073.
Immunochemistry, synthetic, 119.
Indigo-carmine X, adsorption of, at mercury–water interfaces, 596.
Indole group, structure in, 283.
Indole series, synthesis in, 458.
Indolyl-3-acetic acid, α-amino-, methyl ester, 460.
r-**3-Indolylglycine**, synthesis of, 458.
Indolyl-3-glycollic acid, methyl ester, 460.
Indolyl-3-glyoxylic acid, synthesis of, and its derivatives, 458.
o-**Indophenol**, *mm'*-difluoro-, acetylation of, 206.
Iodine, reaction of, with phosphorus in carbon tetrachloride, 583.
Periodates, electrolytic formation of, 256.
Ionisation in non-aqueous solvents, 1329, 1360.
β-**Ionone**, reaction of, with halides in presence of lithium, 1239.
Isotopes, exchange of, in organic compounds, 1362.

K.

Ketoacetyldihydro-oleanolic acid, methyl ester, 1389.
Ketoacetyloleanolic acid, lactone, 1389.
α-**Ketobutaldehyde**, β-bromo-, 2 : 4-*di*bromo- and -*di*chloro-phenylhydrazones, 814.
6-Keto-5-carbethoxy-2-methyl*cyclo*hexylacetic acid, ethyl ester, 417.
7-Keto-$\Delta^{3:5}$-cholestadiene, and 6-*mono*-, and 4:6-*di*bromo-, 663.
7-Ketocholestanyl acetate, 5:6-*di*bromo-, 662.
7-Keto-Δ^{5}-cholestene, 3:4:6-*tri*bromo-, 663.
7-Ketocholesteryl acetate, bromination of, 659.
3-Keto-3:4-dihydro-5:6-benz-4-carboline, 10-chloro-, 317.
7-Keto-3:4-dimethyl*cyclo*hexylacetic acid, ethyl ester, 417.
α-**6-Keto-1:2-dimethyl*cyclo*hexylacetic acid**, and its derivatives, 417.
1-(2'-Keto-1'-*cyclo*hexyl-2''-methoxy-1''-naphthylmethyl)coumaran-2-one, 819.
2-Keto-5-hydroxy-αβ-di*cyclo*hexylidene-ethane, and its derivatives, 14.
Ketolupenyl acetate and benzoate, and their derivatives, 1337.
3-Keto-10-methoxy-1-methyl-3:4-dihydro-4-carboline, 318.
Ketomethoxymethylhexahydrochrysene, 732.
Ketomethoxymethyloctahydrochrysene, 733.
1-Keto-7-methoxy-2-methyl-1:2:3:4-tetrahydrophenanthrene, preparation of, 730.
3-Keto-2-methyl-5:6-(3':4':6'-*O*-acetylglucopyrano)-tetrahydro-1:4-oxazine, 437.
1-Keto-2-methyl-2-ethyl-1:2:3:4-tetrahydrophenanthrene, and its picrate, 1278.
3-Keto-2-methyl-5:6-glucopyranotetrahydro-1:4-oxazine, 436.
2-Keto-1-methyl*cyclo*hexylacetic acid, and its derivatives, 417.
1-Keto-2-methyl-1:2:3:4-tetrahydrophenanthrene, preparation of, 731.
Ketones, condensation of, with phenols, 1103.
unsaturated, cyclodehydration of, 636.
16-Keto-$\Delta^{12:13}$-oleanene, 1472.
16-Keto-oleanolic acid, methyl ester, 1472.
1-Keto-7-phenyl-1:2:3:4-tetrahydronaphthalene, 1030.
5-Keto-1:2:3:4-tetramethyl-5:6:7:8-tetrahydroanthracene, and its semicarbazone, 302.
5-Keto-1-*p*-toluenesulphonyl-2-acetylpyrrolidine, and bromo-, 710.
5-Keto-1-*p*-toluenesulphonyl-2-chloroacetylpyrrolidine, 710.
5-Keto-1-*p*-toluenesulphonylpyrrolidine-2-carboxyamide, 711.
6-Keto-1-*p*-toluenesulphonylpyrrolidine-2-carboxylic acid, 709.
4-Keto-1:2:3-trimethyl-1:2:3:4-tetrahydrophenanthrene, 302.
Ketyls, preparation of, from benzpinacol and potassium, 251.
Ketylic compounds, stability of, in relation to phenoxyl group, 213.

L.

Lactic acid, *tri*chloro-, ethyl ester, phenylurethane, action of alkalis on, 1512.
Δ^{β}-γ-Lactones, reactions of, 438.
Lanthanum chloride, solubility of, 670.
Lauric acid, β-diethylamino- and β-dimethylamino-ethyl esters, and their hydrochlorides, 421.
phenyl ester, Fries rearrangement of, 835.
Lauryl choline chloride and iodide, 422.
Lectures delivered before the Chemical Society, 119, 511, 544, 554.
Leucadendron, leaves, constituents of, 1271.
Leucodrin, oxidation of derivatives of, with lead tetra-acetate and periodic acid, 1271.
Levans, formed by bacterial action, 237.
Linalool, action of ethyl acetoacetate on, 704.
Linkings, double, non-terminal, addition of hydrogen bromide to, 68.
epi-**Lumisterol**, 1392.
Lupanetriol, and its diacetate, 456.
Lupenyl esters, oxidation of, 1335.
2:6-Lutidine, separation of, in mixtures with β- and γ-picolines, 241.

M.

Magnesium carbonate, basic, precipitated, chemical nature of, 96.
Magnesium determination :—
determination of, with 8-hydroxyquinoline, 656.
Malaccol from *Derris malaccensis*, 309.
dl-**Malaccol**, 313.
Maleic anhydride, condensation of, with carenes and α-terpinene, 702.
detection of, colorimetrically, 1374.
reaction of, with eucarvone, 1162.
Malonaldehyde bis-2:4-dinitrophenylhydrazone, 1557.

Malonic acid, bromo-, hydrolysis of ions of, 956.
Maniladiol, and its derivatives, 797.
l-**Matairesinol,** synthesis of, 1088.
dl-, *d*-, and *l*-**Matairesinols,** 1100.
Meconic acid, mercuration of, 667.
Melibiosazone hepta-acetate, 1481.
Memorial Lecture, Sörensen, 554.
l-**Menthyl** butyl sulphide, 227.
Mercuricomenic acid, chloro-, and hydroxy-, anhydride of, 667.
Mercurikojic anhydride, chloro-, and hydroxy-, 669.
Mercuripyromeconic acid, chloro-, 668.
Mercuri-γ-pyrone, *di*chloro-, 666.
Mercurithiophthen, chloro-, 306.
Mercury, adsorption of dyes at water interfaces with, 596.
Mercuric halides, arsine and phosphine derivatives, 1209.
Mercury bisbutylthiol, 1558.
Mesityl oxide, reduction product of, 1547.
Metals of the gold group, analysis of, 1263.
of the tantalum and tungsten group, analysis of, 1258.
toxicity of, towards catalytic platinum, 469.
Metallic chlorides, catalysis by, of styrene polymerisation, 775.
salts, complex, constitution of, 1209, 1230, 1235.
sulphides, formation of, in ethyl and methyl alcohols, 1329.
Metanethole, structure of, and *di*bromo-, and *di*nitro-, 1094.
Methane, *tetra*nitro-, complex formation of, with naphthalenes, 1541.
Methin[2-benzthiazole][2-(3-ethyldihydrobenzselenazole)], and its hydriodide, 804.
Methin[2-benzthiazole][2-(3-ethyldihydrobenzthiazole)], 803.
Methin[2-benzthiazole][2-(3-methyldihydrobenzthiazole)], 804.
Methincyanines, preparation of bases from, 799.
Methin[2-(1-ethyldihydroquinoline)][2-(6:7-benzbenzthiazole)], 807.
Methin[2-(1-ethyldihydroquinoline)][2-benzthiazole], and its hydriodide, 806.
Methin[2-(1-ethyldihydroquinoline)][2-(4:5-benzthiazole)], 806.
Methin[2-(1-methyldihydroquinoline)][2-(4:5-benzbenzthiazole)], 806.
Methin[2-(1-methyldihydroquinoline)][2-benzthiazole], and its hydriodide, 805.
Methin[2-quinoline][2-(3-ethyldihydro-6:7-benzbenzthiazole)], 807.
Methin[2-quinoline][2-(3-ethyldihydrobenzthiazole)], and its hydriodide, 805.
Methin[4-quinoline][2-(3-ethyldihydrobenzthiazole)], 807.
and its hydriodide, 807.
Methin[2-quinoline][2-(1-ethyldihydroquinoline)], 808.
Methin[2-quinoline][2-(3-methyldihydrobenzthiazole)], and its hydrochloride, 805.
Methin[2-quinoline][2-(1-methyldihydroquinoline)], 808.
6-Methoxyaceto-2-naphthalide, 1- and 5-nitro-, 387.
7-Methoxyaceto-2-naphthalide, 1- and 8-nitro-, 386.
Methoxyacetophenones, spectra of, absorption, 1351.
Methoxybenzaldehydes, spectra of, absorption, 1351.
4-Methoxybenzoylcinnamoylmethane, 2-hydroxy-, 1500.
ω-2′-Methoxybenzoyl-2-hydroxyacetophenone, 1106.
ω-2′-Methoxybenzoyl-2-hydroxy-5-methylacetophenone, 1106.
2-(2′-Methoxybenzoyloxy)acetophenone, 1106.
2-(2′-Methoxybenzoyloxy)-5-methylacetophenone, 1105.
β-Methoxy-αα-bis(ethylsulphonyl)propane, γ-hydroxy-, 1563.
5-Methoxy-2-carboxy-β-phenoxypropionic acid, 794.
7-Methoxychroman-3-carboxylic acid, 792.
7-Methoxy-Δ^3-chromen-3-carboxylic acid, 794.
6-Methoxycoumarone-2-acetic acid, and its derivatives, 795.
6-Methoxycoumarone-2-carboxylic acid, and its ethyl ester, 794.
Methoxydinaphthoylmethanes, 2-hydroxy-, 1500.
2-Methoxydiphenyl, 4′-amino-, and its acetyl derivative, and 4′-bromo-, -iodo-, and -nitro-, 1383.
5-Methoxy-2-formyl-β-phenoxypropionic acid, and its derivatives, 793.
10-Methoxy-1-methyl-4-carboline, 3-*mono*- and *tri*chloro-, 318.
2′-Methoxy-6-methylflavone, 1106.
5-Methoxy-1-methylindole-2-carboxydiethylacetalylamide, 318.
5-Methoxy-1-methylindole-2-carboxylic acid, 317.
2-Methoxy-4′-methyltriphenylcarbinol, 877.
7-Methoxy-1-naphthacyl bromide, 1311.
Methoxynaphthoyloxy-1-acetonaphthones, 1500.
6-Methoxy-2-naphthylamine, 1-nitro-, 387.
7-Methoxy-2-naphthylamine, and its diacetyl derivative, 383.
7-Methoxy-2-naphthylamine, 1-nitro-, diacetyl derivative, 386.
Methoxy-2′-naphthyl-5:6-benzochromones, 1500.
2-(2′-Methoxy-1′-naphthyl)chromone, 819.
2-(2′-Methoxy-1′-naphthyl)-3-chromonol, and its acetyl derivative, 818.
2-(2′-Methoxy-1′-naphthyl)-3:4-1″:2″-coumarano-Δ^4-*cyclo*hexen-6-one-1-carboxylic acid, ethyl ester, and its oxime, 819.
1-(2′-Methoxy-1′-naphthylidene)coumaran-2-one, and its derivatives, 819.
7-Methoxy-*N*-nitrosoaceto-2-naphthalide, 1-nitro-, 387.
6-Methoxy-1-Δ^3-pentenyl-1-tetralol, 732.
4-(4′-Methoxyphenoxy)benzaldehyde, 1102.
4-(4′-Methoxyphenoxy)benzoic acid, derivatives of, 1101.
***p*-Methoxyphenyl** α-anilinobenzyl ketone, 349.
γ-*p*-Methoxyphenyl-Δ^β-crotonolactone, 442.
***p*-Methoxyphenyl** α-methylanilinobenzyl ketone, 349.
2-*p*-Methoxyphenyl-1-methyl-5-pyrrolidone, 2-hydroxy-, 442.
6-Methoxy-2-phenylnaphthalene, 383.
6-Methoxy-2-phenylnaphthalene, 5-nitro-, 387.
7-Methoxy-2-phenylnaphthalene, 383.
7-Methoxy-2-phenylnaphthalene, 8-nitro-, 386.
Methoxyphenylpyridines, and their picrates, and nitro-derivatives, 359.
2-*p*-Methoxyphenyl-5-pyrrolidone, 2-hydroxy-, 442.
***p*-Methoxyphenyl** α-*p*-toluidinobenzyl ketone, 349.
6-Methoxytetralin, preparation of, 730.
6-Methoxy-1-tetralone, preparation of, 730.
5-Methoxyvalerophenone, 2-hydroxy-, acetyl derivative, and its derivatives, 1121.
Methyl bromide, hydrolysis of, in aqueous formic acid, 945.
in aqueous solution, 925.
β-Methylaminoethanol, 289.
5′-Methyl-7-*n*-amyl-3:4-benzocoumarin, 5-hydroxy-, and its acetyl derivative, 1395.
6-hydroxy-, and its acetyl derivative, 1121.
5′-Methyl-7-*n*-amyl-3:4-*cyclo*hexenocoumarin, 5-hydroxy-, and its acetyl derivative, 1123.
Methyl *n*-amyl ketone, labile and stable semicarbazones of, 99.
2-Methyl 3:6-anhydroaltrose, 322.
2-Methyl 3:6-anhydro-α-methylaltroside, 322.
Methyl-1:2-benzanthracenes, photo-oxides, 1126.

6-Methyl-1:2-benzanthracene, 10-bromo-, and 10-cyano-, 412.
9-Methyl-1:2-benzanthracene, 10-bromo-, and 10-cyano-, 412.
10-Methyl-1:2-benzanthracene, 10-cyano-, 411.
9-Methyl-1:2-benz-10-anthraldehyde, 412.
1-Methyl-5:6-benz-4-carboline, 3-chloro-, 316.
8-Methyl-3:4-benzfluorene, and its derivatives, 638.
8-Methyl-3:4-benzfluorenone, 638.
5′-Methyl-3:4-benzocoumarin, 6-hydroxy-, and its acetyl derivative, 1120.
Methyl-β-benzoyloxyethyldiethylammonium chloride and iodide, 421.
1-Methyl-3:4-benzphenanthrene, 297.
β-Methylbutane-αγδδ-tetracarboxylic acid, 1345.
2-Methyl-1-Δ$^{\gamma}$-butenyl-3:4-dihydrophenanthrene, 733.
Methyl*iso*butylcarbinyl *p*-xenylurethane, 1549.
2-Methyl-1-*n*-butylphenanthrene, and its derivatives, 734.
2-Methyl-4-butylresorcinol, 246.
3-Methylbutyrophenone, 2:4-*di*hydroxy-, 246.
1-Methyl-4-carboline, 3-chloro-, methosulphate, 316.
α-*O*-Methyl*iso*chondrodendrinemethine hydrochloride, 746.
***O*-Methyl*iso*cocclaurine** methiodide, 745.
***cis*-9-Methyl-3-decalol**, 725.
***O*-Methyldihydrohomopterocarpin**, oxidation of, 792.
***O*-Methyldihydropterocarpin**, oxidation of, 793.
5-Methyldiphenyl, 2-cyano-, 1120.
Methylene-blue, adsorption of, at mercury–water interfaces, 596.
Methylene groups, active, addition of βγ-unsaturated alcohols to, 1266.
addition of αβ-unsaturated alcohols to, 704.
***gem*-Methylethyl groups**, action of selenium on, 1277.
2-Methyl-2-ethyl-1:2:3:4-tetrahydrophenanthrene, and its picrate, 1279.
6-Methylflavone, 2′-hydroxy-, and its acetyl derivative, 1106.
β-Methylgalactopyranoside 6-bromohydrin, 630.
α-Methylgalactoside barium sulphate, 1478.
2-Methyl-4:5-glucopyrano-Δ^{2}-oxazoline, 434.
α-Methylglucoside barium sulphate, 1478.
Methyl-β-glycyloxyethyldiethylammonium dirufianate, 423.
Methylheptadecylmalonic acid, and its ethyl ester, 70.
1-Methyl-Δ$^{2:4}$-*cyclo*hexadiene, preparation and spectrum of, 1463.
16-Methylhexahydrochrysene, and its derivatives, 734.
6-Methyl-Δ^{1}-*cyclo*hexenealdehyde, and its derivatives, 639.
6-Methyl-Δ^{1}-*cyclo*hexenecarboxylic acid, and its derivatives, 639.
5′-Methyl-3:4-*cyclo*hexenocoumarin, 6-hydroxy-, and 7-hydroxy-, acetyl derivative, 1123.
7-Methyl-3:4-*cyclo*hexenocoumarin, 5-hydroxy-, acetyl derivative, 1124.
***cis*-8-Methylhydrindan-1:2-diol**, 726.
***cis*-8-Methyl-2-hydrindanol**, 726.
***N*-Methyl-*N*-β-hydroxyethyl-*N*′-α-naphthylthiourea**, 289.
13-Methyl-13-hydroxytetradecoic acid, 69.
1-Methylindolyl-3-glyoxylic acid, methyl ester, 460.
Methyl-β-lauryloxyethyldiethylammonium iodide, 422.
Methylmalonic acid, α-bromo-, hydrolysis of ions of, 956.
Methyl-6-methoxy-4-quinolylcarbinol hydrochloride, 1313.
2-Methylnonadecane, 1- and 2-bromo-, 70.
2-Methylnonadecan-1-ol, 71.
2-Methylnonadecoic acid, 71.
***cis*-9-Methyl-Δ^{1}-3-octalol**, 725.
***cis*-9-Methyl-Δ^{1}-3-octalone** semicarbazone, 725.
2-Methyl-1:3-*cyclo*pentanedione, 1446.
4-(2-Methyl-*N*-pentyl)aminoazobenzene-4′-arsonic acid, 577.
2-Methyl-*N*-pentylaniline, 576.
2-Methyl-4-β-phenylethylresorcinol, and its di-*p*-nitrobenzoyl derivative, 247.
Methylphloracetophenone, spectrum of, absorption, 1053.
Methylphlor*iso*butyrophenone, and its dimethyl ether, 426.
1-Methylpropenyl*cyclo*hexenedicarboxylic acids, 1344.
3-Methylpropiophenone, 2:4-*di*hydroxy-, 246.
1-Methyl-2-propyl*cyclo*hexane-3:4-dicarboxylic acid, and its anhydride, 1344.
4-Methyl-2-*n*-propyl*iso*phthalic acid, 1346.
2-Methyl-4-propylresorcinol, 246.
2- and **4-Methyl-5:6:3′:2′-pyridoquinolines**, 2-chloro-, and 2-hydroxy-, 1166.
N^{1}-Methylsulphanilamidoacetic acid, ethyl and methyl esters, 1576.
2-Methyl-1:2:3:4-tetrahydronaphthalene-3-carboxylic acid, 2-hydroxy-, lactones, 1325.
N^{4}-4′-Methyl-2′-thiazolylsulphanilamide, 1307.
2-Methylthiophen-5-acetic acid, 3-hydroxy-, ethyl ester, 1387.
***dl*-Methyl δ-*p*-tolylamyl ketone** semicarbazone, 453.
Methyl-β-*o*-tolylethylmalonic acid, and its *p*-nitrobenzyl ester, 1241.
2-Methyl-4:5-(3′:4′:6′-tri-*O*-acetylglucopyrano)-Δ^{2}-oxazoline, 436.
β-Methyl 3:4:6-trimethyl *N*-acetylglucosaminide, 434.
2-Methyl-4:5-(3′:4′:6′-trimethylglucopyrano)-Δ^{2}-oxazoline, 436.
2-Methyl-2-(4′:8′:12′-trimethyltridecyl)chroman, 6-hydroxy-, 330.
Methyltriphenylmethyls, 1242.
Michler's hydrol, reaction of, with sodium nitrite in hydrochloric acid, 93.
Miro tree. See *Podocarpus ferruginea*.
***n*- and *iso*-Miropinic acids**, and their derivatives, 683.
Mobility, measurement of, by conductivity titration, 84.
Monolayers. See Films, *uni*molecular.
Mucilages, seed, 1501.
Myrcene, spectrum of, absorption, 1461.

N.

2-Naphthaldehyde, 1-bromo-, 297.
Naphthalene series, chromones of, 1499.
Naphthalene-6-sulphonic acid, 2-amino-, amide, and its acetyl derivative, 692.
1-Naphthalene-7-sulphonic acid, 1-cyano-, 1310.
α- and **β-Naphthoic acids**, potassium salts of, 861.
Naphthols, preparation of, from hydronaphthalene alcohols and ketones, 1134.
α-Naphthoyldiazomethane, 1310.
β-2-Naphthoyl-αβ-dimethylpropionic acid, and its methyl ester, 301.
β-1-Naphthoyl-α-methyl-α-ethylpropionic acid, 1278.
Naphthoyloxy-1-acetonaphthones, 1500.
1-Naphthoylpalmitylmethane, 2-hydroxy-, 1500.
α-Naphthylacetone 2:4-*di*nitrophenylhydrazone, 821.
α- and **β-Naphthylamine** hydrochlorides, action of *n*-dodecyl alcohol on, 388.
Naphthyl-5:6-benzochromones, 1500.
2-2′-Naphthyl-5:6-benzochromones, hydroxy-, and their acetyl derivatives, 1500.
β-Naphthyl αβ-*di*bromo-β-phenylethyl ketone, 250.
β-Naphthyl α-bromostyryl ketone, 250.
2-Naphthylmalonic acid, 1-bromo-, ethyl ester, 298.
β-Naphthylmethylcarbinol, resolution of, and its derivatives, 676.
γ-1-Naphthyl-α-methyl-α-ethylbutyric acid, 1278.

α- and β-**Naphthylmethylmagnesium** halides, action of acetyl chloride on, 819.
α-**2-Naphthyl-β-phenylpropionic acid**, α-2-1-bromo-, 298.
β-**Naphthyl styryl ketone**, 250.
γ-**Naphthyl-αβγ-trimethylbutyric acid**, 301.
γ-**2-Naphthyl-αβγ-trimethylbutyrolactone**, 300.
Neodymium chloride, solubility of, 670.
Nitro-compounds, structure of, 283.
*poly***Nitro-compounds**, complex formation of, with aromatic bases and hydrocarbons, 1539.
Nitrogen *mon*oxide (*nitrous oxide*), sensitisation of hydrogen–oxygen reaction by, 464.
*di*oxide (*nitric oxide*), reaction of, with chlorine, inhibition of, 823.
Nitrous acid, action of, on formaldehyde, 142.
on *p*-nitrodimethylaniline in hydrochloric acid, 138.
Nitrogen organic compounds, heterocyclic, spectra of, absorption ultra-violet, 844.
Nitrosylsulphuric acid, action of, on *m*-fluorophenol, 205.
reduction of, by sulphur monoxide, 1157.
Nomenclature, inorganic chemical, report of Committee on, 1404.
Norlupanonol, 457.
$\Delta^{3:8(9)}$-**Normenthadiene**, spectrum of, absorption, 1463.

O.

Obituary notices:—
Henry Edward Armstrong, 1418.
Douglas Heriot Baird, 562.
William Heath Bayliss, 1031.
Alfred Berthoud, 1439.
William Thomas Burgess, 100.
William Alexander Skeen Calder, 563.
Wallace Hume Carothers, 100.
Prince Ginori Conti, 563.
Reginald Craven, 102.
William Risden Criper, 103.
Harry Medforth Dawson, 564.
Oliver Gatty, 1440.
Thomas Hartley, 1031.
John Haycock, 568.
George William Thomas Horrod, 569.
Morris Charles Lamb, 569.
Harold Theodore G. van der Linde, 570.
Percival George Lloyd, 104.
James Scott Maclaurin, 571.
Percy George Mander, 1441.
William Frederick Mawer, 572.
Arthur Pinkerton, 1031.
Benjamin Dawson Porritt, 572.
George James Robertson, 104.
Luther Robert Scammell, 1032.
George Baty Scott, 1032.
Frank Thomas Shutt, 1442.
Angus Smith, 1033.
John Trotter, 105.
John Isaac Watts, 1033.
Richard Vernon Wheeler, 573.
Thomas Williams, 1034.
4-*n*-**Octadecylaminoazobenzene-4′-arsonic acid**, 577.
Octadecylaniline, 576.
ar-**Octahydrodinaphthyline**, 201.
ar-**Octahydronaphthidine**, and its diacetyl derivative, 202.
trans-Δ^2-**1-Octalol**, and its acetate, 726.
2:3:4:5:2′:3′:4′:5′-Octamethyldiphenylmethane, 1397.
Octamethyl 3-galactosidogalactose, 81.
β-**Octanol**, dielectric constant of, 894.
β-**Octyl** chlorosulphinate, 228.
Œstrogens, synthetic, related to triphenylethylene, 1327.
Oils, essential, Indian, constituents of, 451.
Oleanenes, 1473.
$\Delta^{12:13}$-**Oleanene**, 16-hydroxy-, 1473.
Olefins, elimination of, from alkyl and aralkyl bromides, 899.
Oleic acid, magnesium salt, relative phase volumes and type of emulsions stabilised by, 211.
Optical activation of acids, 264.
inversion, Walden's, in altrose series, 319.
superposition, studies in, 862.
Optically active compounds, rotation of, influence of solvents on, 290.
Organic compounds, isotopic exchange reactions of, 1362.
Ovomucoid, carbohydrate constituents of, 184.
Oxalic acid, thermodynamic dissociation constants of, 858.
sodium salt, hydrolysis of, 580.
3-Oxalylbenzene-1:2:4-tricarboxylic acid, methyl ester, 1345.
*iso***Oxazoles**, preparation of, from chalkone derivatives, 247.
Oxidation, electrolytic. See under Electrolytic.
Oxine. See Quinoline, 8-hydroxy-.
Oxy-acids, inorganic, heavy oxygen exchange between water and, 131.
Oxygen, heavy, exchange of, between inorganic oxyanions and water, 131.
ignition of, mixed with ether, 143, 151.
reactions of, with hydrogen, sensitised by nitrous oxide, 464.
Oxymercurichlorochloromercuripyromeconic acid, 669.

P.

2-Palmitoyloxy-1-acetonaphthone, 1500.
Papaverine, synthesis of, 1209.
Parachor as criterion for *cis–trans*-isomerism, 280.
Pectic acid, constitution of, 1106, 1114, 1506.
2-Pentadecyl-5:6-benzochromone, 1500.
$\Delta^{\alpha\beta}$-**Pentadiene**, dimeride of, 1176.
*cyclo***Pentadiene**, kinetics of association of, 735.
Δ^{α}-**Pentenoic acid**, deuterium exchange reaction and isomerisation of, 1362.
Perbenzoic acid, oxidation with, of acetyloleanolic acid and its methyl ester, 1387.
Periodates. See under Iodine.
Peroxidase, action of, 769.
Phellandral, constitution of, 808.
Phellandrenes, spectra of, absorption, 1462.
dl-, *d*- and *l*-**Phellandric acids**, and their derivatives, 809.
Phenol, *m*-fluoro-, action of nitrosylsulphuric acid on, 205.
2-fluoro-6-nitro-, and 2-fluoro-4-nitroso-, 811.
3-fluoro-4-nitroso-, 206.
3-fluoro-4- and -6-nitroso-, synthesis of, 1268.
Phenols, condensation of, with ketones, 1103.
nitrosation of, 810, 1268.
p-**Phenoxytriphenylmethane**, 1334.
p-**Phenoxytriphenylmethyl**, 1334.
Phenyl carbonate, action of sodium on, 215.
chlorosulphinate, reaction of, with tertiary bases, 223.
*iso*cyanodichloride, and bromo-, and nitro-, 193.
menthyl sulphite, 225.
3-Phenylacetamido-1-thionaphthen, 326.
2-Phenylaceto-1-naphthalide, and 4-chloro-, and 4-nitro-, 379.
6-Phenylaceto-1- and **-2-naphthalides**, 381.
7-Phenylaceto-1-naphthalide, 382.
1-Phenylacetylbenz*iso*thiazolone, 325.

6-Phenylacetylcoumarin-3-carboxylic acid, 5-hydroxy-, and its ethyl ester, 247.
Phenylalanylcholine chloride hydrochloride and iodide hydriodide, 425.
Phenyl α-anilino-*p*-methoxybenzyl ketone, 348.
Phenylazo-bis-acetoxime, metallic derivatives of, 654.
Phenylazo-bis-benzaldoxime, metallic derivatives, 655.
Phenylazo-bis-methylethylketoxime, metallic derivatives of, 654.
α-Phenylbenzimino-2-carbomethoxy-6-tolyl ether, 272.
Phenylbenzimino-2′-carbomethoxy-6′-tolyl ether, *o*-chloro-, 273.
***N*-Phenylbenzimino-4:6-*di*chloro-2-carbomethoxyphenyl** ether, 273.
β-*p*-Phenylbenzoylpropionic acid, 1030.
Phenyl α-bromo-β-ethoxy-β-2-methoxy-1-naphthylethyl ketone, *o*-hydroxy-, 819.
Phenyl αβ-*di*bromo-β-2-methoxy-1-naphthylethyl ketone, *o*-hydroxy, 818.
Phenyl-(6′-bromo-3′:4′-methylenedioxyphenyl)*iso*oxazoles, 251.
α-Phenyl-β-2-(1-bromonaphthyl)acrylic acid, 297.
α-Phenyl-β-2-(1-bromonaphthyl)ethane, 298.
Phenyl αβ-*di*bromo-β-phenylethyl ketone, *o*-hydroxy-, 250.
γ-Phenyl-Δ^{β}-crotonolactone, γ-*p*-bromo-, 441.
Phenyldi-*p*-bromophenylguanidine, 194.
1-Phenyl-4:3′-dimethylaminobenzylidene-5-pyrazolone, 59.
r-β-Phenyl-γγ-dimethylpropane, r-αγ-*di*hydroxy-, 843.
Phenylditolylguanidines, and bromo- and nitro-, 194.
α-Phenylethyl bromide, olefin elimination from, 899.
bromide and chloride, hydrolysis of, in acetone containing mercuric bromide or chloride, 679.
chlorosulphinite, 228.
β-Phenylethyl bromide, olefin elimination from, 899.
2-Phenyl-1-ethyl-5-pyrrolidone, 2-hydroxy-, 440.
Phenyl heptadecyl ketones, hydroxy-, and their derivatives, 837.
2-Phenyl*cyclo*hexanone, derivatives of, 848.
Phenyl 6-hydroxy-2:3-benzostyryl ketone, *o*-hydroxy-, 818.
β-Phenyl-α-2-(1-hydroxynaphthyl)propionic acid, 298.
Phenyl-2-hydroxy-1-naphthylsulphone, 2′-nitro-, 445.
5-Phenyl-3-*o*-hydroxyphenyl*iso*oxazole, 251.
3-Phenylindole-2-carboxylic acid, 6-chloro-3-*o*-nitro-, 317.
Phenyl 6-methoxy-2:3-benzostyryl ketone, *o*-hydroxy-, and its derivatives, and their reactions, 817.
Phenyl *p*-methoxybenzyl ketone, preparation of, 348.
4-Phenyl-6-(2′-methoxy-1′-naphthyl)-Δ^{3}-*cyclo*hexen-2-one-1-carboxylic acid, 4-*o*-hydroxy-, ethyl ester, and its derivatives, 818.
Phenyl α-methylanilino-*p*-methoxybenzyl ketone, 349.
3-Phenyl-5-(3′:4′-methylenedioxyphenyl)*iso*oxazole, 251.
α-Phenyl-δ-methylpentane-αδε-tricarboxylic acid, ethyl ester, 850.
ε-Phenyl-β-methyl-Δ^{α}-pentene-αε-dicarboxylic acid, α-cyano-, ethyl ester, 850.
1-Phenyl-2-methyl-5-pyrrolidone, 2-hydroxy-, and 2-hydroxy-1-*p*-bromo-, 440.
2-Phenyl-1-methyl-5-pyrrolidone, 2-hydroxy-, 440.
2-hydroxy-2-*p*-bromo-, 442.
2-Phenylnaphthalene, 374.
preparation of, from diphenyl, 1030.
2-Phenylnaphthalene, amino-, bromo-, chloro-, hydroxy-, and nitro-derivatives, and their derivatives, 374, 378.
2-Phenylnaphthalenes, synthesis of, 374.
4-Phenylnaphthalene, 1-nitro-, 211.
2-Phenyl-1:4-naphthaquinone, 2′- and 4′-nitro-, 380.
2-Phenyl-1-naphthylamine, and 4-chloro-, and 4-nitro-, 379.
6-Phenyl-1- and **-2-naphthylamines,** 381.
7-Phenyl-1-naphthylamine, 382.
Phenyl-β-naphthyl*iso*oxazoles, 251.
β-Phenylpropionic acid, β-*o*-cyano-, and its methyl ester, 1076.
r-α-Phenylpropylamine, resolution of, and its salts, 336.
2-Phenyl-1-*n*-propyl-5-pyrrolidone, 2-hydroxy-, 441.
δ-(α-Phenylpropyl)semicarbazide hydrochlorides, 337.
Phenylpyridines, and nitro-, and their derivatives, 349.
α-Phenylpyridine, α-3- and -4-amino-, and α-4-nitroso-amino-, and their acetyl derivatives, 1281.
α-4-bromo-, -chloro-, -cyano-, and iodo-, and their picrates, 355.
β-Phenylpyridine, β-3- and -4-amino-, and their acetyl derivatives, 1281.
γ-Phenylpyridine, γ-3-amino-, and its acetyl derivative, 1282.
γ-4-bromo-, and -chloro-, 356.
α-Phenylpyridine-4-carboxylic acid, methyl ester, 357.
2-Phenyl-5-pyrrolidone, 2-hydroxy-2-*p*-bromo-, 442.
1-Phenyl-1:2:3:4-tetrahydronaphthalene-2:3-dicarboxylic acid, and its derivatives, 1321.
Phenyl α-*p*-toluidino-*p*-methoxybenzyl ketone, 349.
α-Phenyl-β-(3:4:5-trimethoxyphenyl)acrylic acid, and its *p*-phenylphenacyl ester, 199.
α-Phenyl-β-(3:4:5-trimethoxyphenyl)ethylene, α-cyano-, 199.
α-Phenyl-β-(3:4:5-trimethoxyphenyl)propionic acid, *p*-phenylphenacyl ester, 199.
Phenyl undecyl ketones, hydroxy-, and their derivatives, 836.
Phenylvinylcarbinol, action of, with ethyl acetoacetate, 1266.
Phosphorus, reaction of, with iodine in carbon tetrachloride, 583.
Phosphorus chlorides, reaction of, with *n*-butyl alcohol, 1464.
Phosphoryl chloride, reaction of, with *n*-butyl alcohol, 1464.
***N*-γ-Phthalimidopropylformanilide,** 691.
Phthalimidyl-3-acetoacetic acid, ethyl ester, 1073.
Phthalocyanines, 1070, 1076, 1079.
X-ray structure of, 36.
6:7-Phthalylindazole, 367.
Physical properties and constitution, 171, 1528.
β- and **γ-Picolines,** separation of, in mixtures with 2:6-lutidine, 241.
Picryl iodide, crystal structure of, 1398.
***d*-Pinane,** 347.
2-Piperazino-4-methyl-5:6:3′:2′-pyridoquinoline, 1166.
Piperidinobenzonitriles, chloro- and nitro-, 1524.
2-Piperidino-4:6-di-(*p*-tolylthio)nitrobenzene, 1528.
4-Piperidino-2:6-di-*p*-tolylthionitrobenzene, 1527.
Piperidinomethyl-7-methoxy-1-naphthylcarbinol hydrochloride, 1311.
Piperidinomethyl-6-methoxy-4-quinolylcarbinol, and its hydrochloride, 1313.
Piperidinomethyl-1-naphthylcarbinol, and its hydrochloride, 1310.
Piperidinomethyl-5:6:3′:2′-pyridoquinolines, and their salts, 1166.
2-Piperidino-4-methylquinoline, 6-nitro-, 1166.
Piperidinomethyl-4-quinolylcarbinol, preparation of, 1312.
6-Piperidinonitrobenzene, 2:4-*di*bromo-, and 2-chloro-, 1526.
4′:4″-Piperidylpiperidinomethyl-6-methoxy-4-quinolylcarbinol, and its trihydrochloride, 1315.
4′:4″-Piperidylpiperidinomethyl-4-quinolylcarbinol, and its salts, 1313.
1-Piperidino-2:4:6-tri-*p*-toluenesulphonylbenzene, 1527.
Piperylene, spectrum of, absorption, 1461.

Pituitary, posterior lobe, chemistry of oxytocic hormone of, 419.
Plants, Argentine, 1051.
leguminous fish-poison, active principles of, 309, 1178.
Plantago lanceolata, seeds, mucilaginous polysaccharide of, 1501.
Platinum, catalytic. See under Catalysts.
Platinum phthalocyanine, *X*-ray structure of, 36.
Podocarpus ferrugineus, resin from, 683.
Poisons, fish, from leguminous plants, 309, 1178.
Polycyclic compounds, growth-inhibitory, synthesis of, 409.
Polymerisation, 1169, 1176, 1339.
Polymorphism, 588.
Polyporenic acids, and their esters, 634.
Polyporus betulinus, triterpene acids of, 632.
Polysaccharides, 237.
Porphins, *X*-ray structure of, 601.
Potassium, action of, on arylmethyl alcohols in xylene, 881.
Potassium chloride, hydrolysis of, 581.
chromate, hydrolysis of, 581.
*di*chromate, hydrolysis of, 581.
sulphamate, crystal structure of, 1.
Praseodymium chloride, solubility of, 670.
Propaldehyde, α-bromo-, diethylacetal of, reaction of, with ethylthiol, 1553.
2-*iso*Propenyl-3:4-benzphenanthrene, picrate, 298.
4-*iso*Propenyl-*m*-cresol, dimeride, 1105.
***O*-*iso*Propenylphenols**, dimeric, structure of, 1103.
3-Propionamido-1-thionaphthen, and 2-bromo-, and 2-nitro-, 326.
Propionyl-3:4-benzphenanthrenes, and their semicarbazones, 1161.
1-Propionylbenz*iso*thiazolone, 325.
6-Propionylcoumarin-3-carboxylic acid, 5-hydroxy-, 246.
***N*-Propionylglucosamine**, *N*-α-hydroxy-, 433.
2-Propionylnaphthalene, 2-α-bromo-, 301.
***iso*Propyl** bromide, hydrolysis of, in aqueous formic acid, 945.
in aqueous solution, 925.
olefin elimination from, 899.
4-*n*-Propylaminoazobenzene-4′-arsonic acid, 577.
α-*n*-Propylaminopropionic acid, and its benzenesulphonyl derivative, 1293.
10-*iso*Propyl-1:2-benzanthracene photo-oxide, 1126.
Propyl-3:4-benzphenanthrenes, and their derivatives, 1161.
2-*iso*Propyl-3:4-benzphenanthrene, and its picrate, 298.
***iso*Propylidene** groups, stability of, 68.
***iso*Propylpyridinium** ferrocyanide, 229.
Protons, heat of hydration of, 1403.
Pterocarpin, 787.
Pyridine, reaction of, with nitrosoacylarylamines, 372.
with tetrahalogenated *p*-benzoquinones, 1378.
5:6:3′:2′-Pyridoquinoline, derivatives of, 1164.
5:6:3′:2′-Pyridoquinoline, 4-chloro-, and 4-hydroxy-, 1168.
3- and 4-Pyridyldiphenyls, and their derivatives, 1279.
4-α-Pyridyldiphenyl, 2′- and 4′-amino-, and 2′- and 4′-nitro-, and their derivatives, 1283.
4-β- and -γ-Pyridyldiphenyls, 2′- and 4′-nitro-, 1284.
Pyrites, determination in, of sulphur, 401.
γ-Pyrone, derivatives, mercuration of, 663.

Q.

Quaterphenyl, 1379.
Quaterphenyl, 4:4‴-*di*amino-, 4:4‴-*di*chlorohydroxy-, *di*hydroxy-, and 4:4‴-*di*nitro-, and their derivatives, 1382.
Quillaic acid, structure of, and its derivatives, 612, 1469.
Quillaic acid, methyl ester, conversion of, into a hydrocarbon, 1335.
Quillaol, 1472.
Quinitol acetates, 13.
Quinol, oxidation of, with sodium chlorate, 1092.
Quinoline, 6-amino-4-hydroxy-, and its salts, 1168.
8-hydroxy-, as reagent for magnesium, 656.
Quinoline-2-carboxylic acid, 6-amino-4-hydroxy-, and its 6-acetyl derivative, ethyl ester, 4-hydroxy-, and 6-nitro-4-hydroxy-, ethyl esters, 1167.
Quinoline–sulphur *tri*oxide, 230.
Quinolinium sulphite, 226.
4-Quinolyl chloromethyl ketone, 1311.
4-Quinolyl diazomethyl ketone, 1311.

R.

Radicals, free, 213, 874, 880, 883, 1242, 1249.
Radix pareiræ bravæ, botanical source of, 737.
Reactions, aromatic side-chain, polar effects of substituents in, 692.
elimination, 899.
Refractive index of cyano-esters, 1528.
Report of the Council, 481.
Resins, elemi Manila, constituents of, 795.
miro, 683.
natural phenolic, constituents of, 1098, 1321.
Resinols, triterpene, 1196, 1198, 1387.
Resonance, in relation to activation energies and dissociation constants, 1447.
Resorcinol nucleus, γ-substitution in, 245.
Rhodizonic acid, barium salt, as indicator, 401.
Rocks, carbonate and silicate, determination in, of magnesium, 656.
Rotation of optically active compounds, influence of solvents on, 290.
Rottlerin and its derivatives, spectra of, absorption, 1052.

S.

Salicylidene-*o*-aminophenol, vanadium derivatives, 1068.
Salts, dissociation of, in water, 87.
hydrolysis of, in solution, 578.
Salt deuterates, 72.
Salt hydrates, 72.
Sapogenins, 612, 617, 713, 1469.
Saponaria officinalis, sapogenin of, 617.
Saporubin, 618.
Sarcostin, and its derivatives, 1443.
Seeds, mucilage from, 1501.
Selenium, action of, on *gem*-methylethyl groups, 1277.
Selenium organic compounds, 831.
α-Selenobenzoic acid, 832.
Semicarbazides, optically active, preparation of, 336.
Silica gel, adsorption by, 158.
Sitosterol, and its acetate and bromoacetate, 1546.
Sodium hydrogen carbonate, hydrolysis of, 581.
*poly*iodides, 837.
nitrite, reaction of, with Michler's hydrol in hydrochloric acid, 93.
Sodium organic compounds:—
Sodium ethoxide, racemisation of carboxylic esters by, 216.
Sörensen Memorial Lecture, 554.
Solids, adsorption by, of gases, 156.
monolayers on, 511, 773.
Solutions, structure of, relation of, to thermal expansion coefficient, 870.

Solvents, effect of, in dipole-moment measurements, 752.
on temperature coefficients in complex formation, 1539.
non-aqueous, acid catalysis in, 1202.
ionisation in, 1329, 1360.
Solway ultra-blue B, adsorption of, at mercury–water interfaces, 596.
Sorbic acid, methyl ester, polymerisation of, by heat, 1339.
Spectra, absorption, of hydroxy-aldehydes, hydroxy-ketones, and their methyl ethers, 1347.
of organic compounds in solution, 1453.
of rottlerin, and its derivatives, 1052.
ultra-violet, of heterocyclic nitrogenous compounds, 844.
Starch, banana, constitution of, 390.
methylated, acetolysis of, 276.
Steam–carbon complex, 177.
Stearic acid, phenyl ester, Fries rearrangement of, 835.
Steroids, 60.
Sterols, structure of, 509.
Sterol group, 659, 1390, 1482.
Sterol-œstrone group, 848.
Stigmasterol, and its acetate, and *tetra*bromo-, acetate, 1546.
Styrene, polymerisation of, catalytically, 775.
thermal, 48.
Styrene, bromo- and chloro-ω-nitro-derivatives, 449.
Substitution at saturated carbon atoms, 913, 920, 923, 935, 940, 945, 949, 956, 960, 966, 971, 974, 979, 1011, 1017.
Succindianilide, 3:3′-*di*chloro- and -*di*nitroso-, 366.
Succinic acid, thermodynamic dissociation constants of, 858.
Succino-*m*-chlorophenylimide, 366.
Sucrose, action of bacteria on, 237.
Sugars, methylated, syntheses of, by means of benzyl radical, 453, 1147.
Sulphamic acid, crystal structure of, 10.
Sulphanilamide, derivatives of, 1574.
piperazine and pyridine derivatives of, 202.
Sulphanilamidoacetic acid, ethyl and methyl esters, 1575.
Sulphates. See under Sulphur.
2-Sulphinodiphenyl ether, 2′-nitro-4-hydroxy-, 446.
3′-Sulphobenzeneazo-β-naphthol, copper salts, 611.
5′-Sulphobenzeneazo-β-naphthol, 2′-hydroxy-, aluminium and ammonium salts, 607.
copper derivatives, 611.
vanadium derivative, 1069.
5′-Sulphobenzeneazo-β-naphthol-6-sulphonic acid, 2′-hydroxy-, cupric salt, 611.
vanadium salts, 1069.
5′-Sulphobenzeneazoresorcinol, 2-hydroxy-, vanadium derivatives, 1069.
4-Sulphonamidophenylthiourea, 1307.
4′-Sulphonaphthalene-1′:4-azo-1-phenyl-3-methylpyrazol-5-one, 2′-hydroxy-, aluminium and ammonium salts, 607.
Sulphonoxypropionic acid, α-chloro-, ethyl ester, 229.
Sulphur, monoclinic, transformation of, into rhombic form, 588.
Sulphur *mon*oxide, reduction of nitrosylsulphuric acid by, 1157.
Sulphates, determination of, volumetrically, with barium rhodizonate, 401.
Sulphur organic compounds, 831.
Sulphurous acid, esters, 218.
Sulphur determination:—
determination of, in pyrites, 401.
Sulphurous acid. See under Sulphur.
Sulphuryl chloride, reaction of, with dibenzyl disulphide, 641.
Surface pressure, measurement of, in films, 114.

T.

ψ-**Taraxasterol**, and its derivatives, 798.
Tartaric acid, *iso*butyl ester, rotation of, in various solvents, 291.
Tautomerism, three-carbon, influence of poles and polar linkings on, 1560.
Tellurium organic compounds, 831.
Tephrosia toxicaria, constituents of, 1178.
Terpenes, catalytic dehydrogenation of, and of terpene ketones, 1139.
Terpenoid compounds, diene syntheses with, 1162.
α-**Terpinene**, condensation of, with maleic anhydride, 702.
spectrum of, absorption, 1463.
Tetra-acetyl aldehydophenylglucosides, and their derivatives, 1402.
Tetra-acetyl 1-cryptylglucosides, 244.
Tetra-acetyl dihydrocryptylglucosides, 244.
Tetra-acetyl menthylglucosides, 243.
Tetra-acetyl 4-methyl*cyclo*hexylcarbinylglucosides, 244.
Tetra-acetyl 1-3-methyl*cyclo*hexylglucosides, 244.
Tetra-acetylmucic acid, *l*-menthyl and octyl esters, 865.
Tetra-acetyl 4-*iso*propyl*cyclo*hexylcarbinylglucosides, 244.
Tetra-acetyl-*dl*-talomucic acid, ethyl ester, 865.
Tetra-arylarsonium salts, 1192.
Tetra-arylphosphonium salts, 1192.
Tetra-arylstibonium salts, 1192.
Tetrabenzazaporphin, and its metallic derivatives, 1079.
X-ray structure of, 602.
Tetrabenzporphin, and its metallic derivatives, 1079.
X-ray structure of, 602.
Tetrabenzporphins, intermediates for, 1070, 1076.
4-*n*-Tetradecylaminoazobenzene-4′-arsonic acid, 577.
Tetradecylaniline, 576.
Tetrahydrodibenzpyran, derivatives, synthesis of, 1121.
Tetrahydromalaccol, and its triacetyl derivative, 313.
α- and β-**Tetrahydromiropinic acids**, 685.
1:2:3:4-Tetrahydronaphthalene-2:3-dicarboxylic acid, and its derivatives, 1321.
3:4:5:4′-Tetramethoxystilbene, 200.
1:2:3:4-Tetramethylanthracene, and its derivatives, 302.
1:2:3:4-Tetramethylanthraquinone, 303.
5:6:9:10-Tetramethyl-1:2-benzanthracene, and its picrate, 18.
photo-oxide, 1126.
2:4:4:7-Tetramethylchroman-2-carboxylic acid, 1105.
1:2:9:10-Tetramethyl-9:10-dihydroanthracene, 9:10-*di*hydroxy-, 18.
5:6:9:10-Tetramethyl-9:10-dihydro-1:2-benzanthracene, 9:10-*di*hydroxy-, 18.
Tetramethyldinaphthyline, 202.
3:3′:4:4′-Tetramethyl-1:1′-dinaphthylmethane, 299.
2:3:4:6-Tetramethyl α- and β-**methyl-*d*-galactosides**, relation between refractive index and specific rotation in mixtures of, 1543.
2:3:4:5-Tetramethyl mucic acid, methyl ester, 1114.
1:2:3:4-Tetramethylnaphthalene, and 1-chloro-, 302.
β-**6-(1:2:3:4-Tetramethylnaphthoyl)propionic acid**, 302.
β-**6-(1:2:3:4-Tetramethylnaphthyl)butyric acid**, 302.
Tetramethyl-*ar*-octahydrodinaphthyline, 202.
1:2:3:4-Tetramethylphenanthrene, 1396.
1:2:3:4-Tetramethyl-10-phenanthroic acid, 1398.
α-**2′:3′:4′:5′-Tetramethylphenylcinnamic acid**, *o*-hydroxy-, and its methyl ester, and *o*-nitro-, 1397.
Tetramethyl*iso*propylnaphthaquinone, 1176.

1:2:3:4-Tetramethyl-5:6:7:8-tetrahydroanthracene, 302.
2:2:5′:4″-Tetramethyl-3′:4′:5′:6′-tetrahydrodibenzpyran, 6″-hydroxy-, and its acetyl derivative, 1124.
Tetraphenylarsonium salts, 1194.
Tetraphenylphosphonium salts, 1195.
Tetraphenylstibonium salts, 1195.
N^4-2′-Thiazolylsulphanilamides, synthesis of, 1304.
Thioacetals, 1550, 1553, 1558.
Thio-*p*-cresol, piperidine salt, 1528.
Thionaphthens, preparation of, 323.
Thiophen derivatives, preparation of, 1385.
Thiophen-5-acetic acid, 3-chloro-, and 3-hydroxy-, ethyl esters, 1387.
Thiopheno-2′:3′-3-2-thiophen, substituted derivatives of, 305.
Thiophen-5-α-propionic acid, 3-hydroxy-, ethyl ester, 1387.
Thiophthencarboxylic acid, and its derivatives, 307.
Thiophthendicarboxylic acid, and its dimethyl ester, 308.
Thiophthienyl methyl ketone, and its derivatives, 306.
Thiophthienyl ethyl ketone, and its 2:4-dinitrophenylhydrazone, 306.
Thyronine, synthesis of, and its derivatives, 1101.
Tilden Lecture, 544.
α-Tocopherol, homologues of, 327.
Toluene, 5-bromo-*p*-amino-, toluenesulphonyl derivative, and 3-bromo-4-nitro-, 450.
Toluene-3:4-bis(thiotriethylphosphinegold), 1238.
***p*-Toluenesulphinic acid**, potassium hydrogen salt, 862.
α-*p*-Toluenesulphonamidoacetone, α′-chloro-, 711.
ω-*p*-Toluenesulphonamidoacetophenone, 711.
α-Toluenesulphonamido-δ-ketohexoic acid, and bromo-, 710.
***p*-Toluenesulphon-2-chloro-4:6-*di*nitroanilide**, 1523.
***N*-*p*-Toluenesulphonylaspartic acid**, anhydride and methyl ester of, 712.
2-*p*-Toluenesulphonylbenzamide, 4-chloro-, 1523.
2-*p*-Toluenesulphonylbenzoic acid, 4-chloro-, 1523.
***p*-Toluenesulphonylbenzonitriles**, chloro-, and nitro-, 1523.
***N*-*p*-Toluenesulphonylglutamic acid**, 709.
***dl*-*p*-Toluenesulphonylglutamic acid**, 711.
***N*-*p*-Toluenesulphonyl*iso*glutamine**, 711.
3-*p*-Toluenesulphonyl 2-methyl α-methylaltroside, and its 4:6-dibenzoyl derivative, 322.
6-*p*-Toluenesulphonylnitrobenzene, 2:4-*di*bromo-, and 2:4-*di*chloro-, 1527.
***p*-Toluenesulphonylpiperidinobenzonitriles**, 1525.
***p*-Toluenesulphonyl-*p*-tolylthiobenzonitriles**, 1524.
3-*p*-Toluenesulphonyl 6-triphenylmethyl 2-methyl α-methylaltroside, and its 4-acetyl derivative, 323.
***p*-Toluidine**, oxidation of, by peroxidase, 769.
4-*p*-Toluidino-2:5-toluquinonebis-*p*-tolylimine, 772.
γ-*p*-Toluoyl-*n*-butyric acid, and its derivatives, 452.
Toluquinol *di*benzoate, 329.
2:5-Toluquinonebis-*p*-tolylimine, 4-amino-, 771.
Tolyl *iso*cyano*di*chlorides, 193.
δ-*p*-Tolyl-*n*-amyl alcohol, and its derivatives, 452.
δ-*p*-Tolyl-*n*-amyl chloride, 452.
Tolylazo-bis-acetoximes, metallic derivatives of, 654.
***m*-Tolylazo-bis-methylethylketoxime**, and its metallic derivatives, 655.
***N*-*o*-Tolylbenzimino-2′-carbomethoxy-6-tolyl ether**, 272.
***m*-Tolyl benzyl ketone**, 2:6-*di*hydroxy-, 247.
γ-*p*-Tolyl-Δ^{β}-crotonolactone, 441.
***p*-Tolyldi-*p*-bromophenylguanidine**, 194.
***p*-Tolyldiphenylguanidine**, 194.
Tolylditolylguanidines, 194.
β-*o*-Tolylethyl alcohol, 1241.
δ-*p*-Tolyl-Δ^{γ}-hexenoic acid, 452.
δ-*p*-Tolyl-*n*-hexoic acid, and its esters, 452.
2-*o*-Tolylidene*cyclo*hexanone, 638.
2-*o*-Tolylidene-α-tetralone, 638.
ζ-*p*-Tolyl-β-methylheptane, ***dl*-β-hydroxy-**, and its xenylurethane, 453.
2-*p*-Tolyl-1-methyl-5-pyrrolidone, 2-hydroxy-, 441.
2-*p*-Tolyl-5-pyrrolidone, 2-hydroxy-, 441.
3-(*p*-Tolylthio)acetanilide, 5-chloro-2-nitro-, 1528.
3-(*p*-Tolylthio)aniline, 5-chloro-2-nitro-, 1528.
***p*-Tolylthiobenzonitriles**, chloro-, and nitro-, 1523.
6-*p*-Tolylthionitrobenzene, 2:4-*di*bromo-, and 2-*mono*- and 2:4-*di*-chloro-, 1526.
***dl*-γ-*p*-Tolyl-*n*-valeric acid**, and its ethyl ester, 452.
6-Tosyl α-methylgalactopyranoside, 623.
Toxicity, catalytic, and chemical structure, 252, 469.
Triarylcarbinols, reduction of, 874.
Tri-*p*-bromophenylguanidine, 194.
(Triethylphosphine)gold, *mono*- and *tri*-bromo-, bromoiodo-, chlorobromo-, chlorobromoiodo- and chloroiodo-derivatives, and *tri*chloro-, and *tri*iodo-, 1238.
Trimethin[2-benzthiazole][2-(3-ethyldihydrobenzthiazole)], 804.
1:3:8-Trimethoxyanthraquinone, 428.
Trimethoxydibenzoylmethanes, hydroxy-, 1373.
5:6:4′- and **5:8:4′-Trimethoxyflavones**, 1373.
2:4:2′-Trimethoxytriphenylcarbinol, preparation of, 878.
2:4:2′-Trimethoxytriphenylmethane, preparation of, 878.
3:4:6-Trimethyl *N*-acetylglucosamine, 434.
2:4:5-Trimethyl aldehydo 3:6-anhydrogalactose, 628.
αγγ-Trimethylallyl alcohol, preparation of, and its derivatives, 1549.
Trimethylallylammonium chloride and picrate, 1559.
2:2:5′-Trimethyl-4″-*n*-amyldibenzpyran, 5″-hydroxy-, 1121.
6″-hydroxy-. See Cannabinol.
2:2:5′-Trimethyl-4″-*n*-amyl-3′:4′:5′:6′-tetrahydrodibenzpyran, 6″-hydroxy-, 1124.
2:4:5-Trimethyl 3:6-anhydrogalactonic acid, and its methyl ester, 628.
2:4:5-Trimethyl 3:6-anhydrogalactose dimethylacetal, 628.
2:3:5-Trimethyl *d*-arabofuranose, 31.
Trimethyl-1:2-benzanthracenes, photo-oxides, 1126.
6:9:10-Trimethyl-1:2-benzanthracene, and its picrate, 17.
2-(2′:4′:6′-Trimethylbenzylidene)-α-hydrindone, 639.
2-(2′:4′:6′-Trimethylbenzylidene)-α-tetralone, 638.
Trimethyl-γγ-bis(ethylthio)propylammonium picrate, 1564.
Trimethyl-β-chloropropylammonium chloride and picrate, 1562.
Trimethyl-γ-chloropropylammonium chloride and picrate, 1559.
2:2:4″-Trimethyldibenzpyran, 6″-hydroxy-, 1395.
2:2:5′-Trimethyldibenzpyran, 5″-hydroxy-, and its derivatives, 1120, 1396.
6:9:10-Trimethyl-9:10:dihydro-1:2-benzanthracene, 9:10-*di*hydroxy-, 17.
2:3:5-Trimethylgalactonic acid, derivatives of, 1116.
2:3:5-Trimethyl γ-galactonolactone, 1116.
Trimethyl galactose methylphenylphenylosazone, 1481.
3:4:6-Trimethyl glucosamine, *N*-benzoyl derivative, 31. hydrochloride, 31, 434.
δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-methyl-$\Delta^{\alpha\gamma}$-butadiene, 1240.
δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-methyl-Δ^{γ}-buten-β-ol, 1240.
δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-phenyl-Δ^{γ}-buten-β-ol, 1241.
Trimethyl-γ-hydroxypropylammonium chloride and picrate, 1559.
2:3:5-Trimethyl methylgalactofuranoside, 1116.

2:3:5-Trimethyl β-methylgalactofururonoside, methyl ester, 1112, 1117.
2:3:4-Trimethyl β-methylgalactopyranoside, 1511.
2:3:5-Trimethyl β-methylgalacturonoside, methyl ester, synthesis of, 1114.
3:4:6-Trimethyl α-methylglucosaminide, *N*-acetyl derivative, 30.
2:3:5-Trimethyl mucic acid, derivatives of, 1112, 1117.
1:2:3-Trimethylnaphthalene, 1-chloro-, 302.
1:3:4-Trimethylnaphthalene, 1-chloro-, 299.
(Trimethylphosphine)gold, bromo-, 1237.
Trimethyl-Δ^{α}-propenylammonium salts, 1562.
2:3:5-Trimethyl *l*-rhamnonic acid phenylhydrazide, 1051.
2:3:5-Trimethyl saccharo-γ-lactone, methyl ester, 1045.
2:2:5′-Trimethyl-3′:4′:5′:6′-tetrahydrodibenzpyran, 5″-hydroxy-, 1396.
5″- and 6″-hydroxy-, and their acetyl derivatives, 1124.
r-**αββ-Triphenyl-α-benzylethane,** *r*-β-hydroxy-, 843.
Triphenylcarbinol, *p*-fluoro-, 1254.
Triphenylmethyl, stability of, effect of methyl groups on, 883.
Triphenylmethyl, fluoro-, 1249.
Triphenylmethyl chloride, action of formic acid on, 1333.
p-fluoro-, 1254.
ethyl ether, action of formic acid on, 1333.
*per*oxide, *p*-fluoro-, 1255.
Triphenylphosphine, colour reactions of, 1374.
(Tri-*n*-propylphosphine) gold, chloro*di*bromo-, 1238.
Tri-*n*-propylphosphinetri-*n*-amylphosphine-μ-di-iodo-cadmium-mercury, *di*iodo-, 1233.
Tripropylphosphinetripropylarsine-μ-di-iodocadmium-mercury, *di*iodo-, 1234.
aaγ-Tris(ethylsulphonyl)propane, 1557.
aaβ-Tris(ethylthio)propane, 1555.
aaγ-Tris(ethylthio)propane, 1557.
Triterpene group, 230, 795.
Triterpene resinols. See under Resinols.
p-**Tritolylenediarsine,** 1190.
Tritolylguanidines, 194.
2:4:6-Tri-*p*-tolylthionitrobenzene, 1527.
6-Trityl methylgalactofuranoside, 1116.
6-Trityl 2:3:5-trimethyl methylgalactofuranoside, 1116.
6-Trityl 2:3:4-trimethyl β-methylgalactopyranoside, 1510.
Tropane, *di*hydroxy-, derivatives of, 1156.
r-**Tropic acid,** methyl ester, action of Grignard reagents on, 840.
Tuberculosis, chemotherapy of, 505.

U.

Uridine, preparation of, 747.
Uridine 3- and 5-phosphates, synthesis of, 746.
Uridylic acid, synthesis of, 746.

V.

Valency, theories of, 544.
Valeroidine, and its derivatives, 1156.
Vallesia dichotoma and *glabra,* aspidospermine from, 1051.
Vanadic acid. See under Vanadium.
Vanadium *tetr*oxide, amphoteric nature of, 758.
*pent*oxide, basic nature of, 895.
Vanadous chloride, hydroxide and sulphate, 761.
Vanadic acid, 764.
Vanadium organic compounds, with azo-dyes, 1064.
Vanadium ions, oxidation–reduction potentials of, 1532.
Velocity of reaction in solution, effect of alkyl groups on, 339.
Vitamins, antirachitic, synthesis of compounds related to, 10.
Vitamin-*E*, 327.

W.

Walden inversion in altrose series, 319.
Water, evaporation of, through unimolecular films, 106.
vapour, reaction of, with carbon, 177.
Wood, "insoluble red," chemistry of, 787.

X.

o-**Xylene,** 3-bromo-, preparation of, 17.

Y.

Yeast ribonucleic acid, constitution of, 746.

Z.

Zea mays, stigmas, constituents of petroleum extracts of, 1545.
Zinc sulphate, hydrolysis of, 580.
Zingiberene, spectrum of, absorption, 1462.
Zymostane, 1488.
Zymostane-C_2||C_3-dicarboxylic acid, and its methyl ester, 1488.
Zymostanol, and its derivatives, 1487.
Zymostanone, and bromo-, 1488.
α- and **β-Zymostenols,** and their derivatives, 1486.
Zymosterol, constitution of and its derivatives, 1482.

FORMULA INDEX.

THE following index of organic compounds of known empirical formula is arranged according to Richter's system (see *Lexikon der Kohlenstoff-Verbindungen*).

The elements are given in the order, C, H, O, N, Cl, Br, I, F, S, P, and the remainder alphabetically.

The compounds are arranged—

Firstly, in groups according to the number of carbon atoms (thus C_1 group, C_2 group, etc.).

Secondly, according to the number of other elements besides carbon contained in the molecule (thus 5 IV indicates that the molecule contains five carbon atoms and four other elements).

Thirdly, according to the nature of the elements present in the molecule (given in the above order).

Fourthly, according to the number of atoms of each single element (except carbon) present in the molecule.

Salts are placed with the compounds from which they are derived. The chlorides, bromides, iodides, and cyanides of quaternary ammonium bases, however, are registered as group-substances.

C_1 Group.

CO Carbon monoxide, preparation of, from carbonates, 213.
CCl_4 Carbon tetrachloride, adsorption of, 159; dielectric constants of, 894.

1 II

CHN Hydrocyanic acid, polymerisation of, 1206; studies on, 407.
$CHCl_3$ Chloroform, adsorption of, by chromic oxide, 162; dielectric constant of, 894.
CH_2O Formaldehyde, action of nitrous acid on, 142.
CH_2Br Methyl bromide, hydrolysis of, in aqueous formic acid, 945; hydrolysis of, in aqueous solution, 925.

1 III

CH_3ON Formamide, refractivity of, 869.

C_2 Group.

$C_2H_2O_2$ Oxalic acid, sodium salt, hydrolysis of, 580.
$C_2H_4O_2$ Acetic acid, distribution of, between benzene and water, 850; lead salt, reaction of, with ethylene glycol, 82; sodium salt, hydrolysis of, 580.
C_2H_5Br Ethyl bromide, hydrolysis of, in aqueous formic acid, 945; hydrolysis of, in aqueous solution, 925; olefin elimination from, 899.
C_2H_6O Ethyl alcohol, dielectric constant of, 894.
$C_2H_6O_2$ Ethylene glycol, reaction of, with lead tetra-acetate, 82.

2 III

C_2H_5ONa Sodium ethoxide, racemisation of carboxylic esters by, 216.

C_3 Group.

C_3H_6O Acetone, dielectric constant of, 894.
C_3H_7Br *iso*Propyl bromide, hydrolysis of, in aqueous formic acid, 945; hydrolysis of, in aqueous solution, 925; olefin elimination from, 899.

3 III

C_3H_9ON β-Methylaminoethanol, and its picrate, 289.

3 IV

C_3H_8BrPAu Bromo(trimethylphosphine)gold, 1237.
$C_3H_9Br_3PAu$ Tribromo(trimethylphosphine)gold, 1238.

C_4 Group.

$C_4H_2O_3$ Maleic anhydride, detection of, 1374.
C_4H_9Cl *tert.*-Butyl chloride, substitution of, with water and anions in formic acid solution, 935.
C_4H_9Br *n*-Butyl bromide, substitution of, with water and anions in formic acid solution, 940.
tert.-Butyl bromide, hydrolysis of, in acetone, 913, 960; hydrolysis of, in aqueous formic acid, 945; hydrolysis of, in aqueous solution, 925; olefin elimination from, 899.
$C_4H_{10}O$ *n*-Butyl alcohol, reaction of, with phosphorus chlorides and oxychloride, 1464.
Ethyl ether, ignition of, mixed with oxygen, 143, 151.

4 III

$C_4H_4O_2N_2$ Barbituric acid, spectrum of, 1275.
$C_4H_8O_3N_2$ *dl*-Asparagine, preparation of, 1489.
$C_4H_8N_2S$ 2-Imino-5-methylthiazolidine, resolution of, and its salts, 338.
$C_4H_9O_4N$ *dl*-Aspartic acid, preparation of, 1489.

4 IV

$C_4H_4O_2Cl_6Se$ Bis-($\beta\beta\beta$-trichloro-α-hydroxyethyl) selenide, 832.
$C_4H_9O_2Cl_2P$ *n*-Butoxyphosphoryl dichloride, 1466.

C_5 Group.

C_5H_6 *cyclo*Pentadiene, kinetics of association of, 735.

5 II

$C_5H_5N_5$ Adenine, spectrum of, absorption ultra-violet, 844.
$C_5H_{10}O_3$ Ethyl carbonate, action of sodium on, 216.

5 III

C_5H_9ClS γ-Chloro-α-ethylthio-Δ^{β}-propene, 1553.
$C_5H_{10}OS$ α-Ethylthiopropaldehyde, 1557.
β-Ethylthiopropaldehyde, 1562.
$C_5H_{11}O_2N$ α-Ethylaminopropionic acid, 1293.

5 IV

$C_5H_2O_3Cl_2Hg_2$ Oxymercurichlorochloromercuripyromeconic acid, 669.
$C_5H_3O_3ClHg$ Chloromercuripyromeconic acid, 668.
$C_5H_9O_5ClS$ Ethyl α-chlorosulphonoxypropionate, 229.

C_6 Group.

C_6H_6 Benzene, dielectric constant of, 894.

6 II

$C_6H_4O_2$ *p*-Benzoquinone, detection of, 1374.
C_6H_5Cl Chlorobenzene, dielectric constant of, 894.
$C_6H_6O_2$ Quinol, oxidation of, with sodium chlorate, 1092.
$C_6H_8O_2$ 2-Methyl-1 : 3-*cyclo*pentanedione, 1446.
$C_6H_{10}O_2$ 4-Hydroxy*cyclo*hexanone, 13.
$C_6H_{10}O_6$ Tetrahydroxyadipic acid, 865.
$C_6H_{13}N$ Trimethyl-Δ^{α}-propenylamine, picrate of, 1562.

6 III

$C_6H_2O_5Hg$ Hydroxymercuricomenic anhydride, 667.
$C_6H_4O_4Hg$ Hydroxymercurikojic anhydride, 669.
$C_6H_5O_2N$ Nitrobenzene, dielectric constant of, 894.
$C_6H_6O_2S$ Benzenesulphinic acid, potassium hydrogen salt, 862.
$C_6H_{12}O_9S$ Galactose sulphate, barium and brucine salts, 1477.
Glucose sulphate, barium and brucine salts, 1477.
$C_6H_{13}O_2N$ Butylaminoacetic acids, 1292.
α-*n*-Propylaminopropionic acid, 1293.

6 IV

$C_6H_2O_6N_2I$ Picryl iodide, crystal structure of, 1398.
$C_6H_3O_5ClHg$ Chloromercuricomenic acid, 667.
$C_6H_3ClS_2Hg$ Chloromercurithiophthen, 306.
$C_6H_4O_3NF$ 2-Fluoro-4-nitrosophenol, 811.
3-Fluoro-4-nitrosophenol, 206.
3-Fluoro-6-nitrosophenol, 1270.
$C_6H_4O_3NF$ 2-Fluoro-6-nitrophenol, 811.
$C_6H_5O_4ClHg$ Chloromercurikojic acid, 670.
$C_6H_{15}Cl_3PAu$ Trichloro(triethylphosphine) gold, 1238.
$C_6H_{15}BrPAu$ Bromo(triethylphosphine)gold, 1238.
$C_6H_{15}Br_3PAu$ Tribromo(triethylphosphine)gold, 1238.
$C_6H_{15}I_3PAu$ Tri-iodo(triethylphosphine)gold, 1238.
$C_6H_{15}Br_4P_2Cd_2$ Dibromobistrimethylphosphine-μ-dibromodicadmium, 1217.
$C_6H_{15}I_4P_2Cd_2$ Di-iodobistrimethylphosphine-μ-di-iododicadmium, 1217.

6 V

$C_6H_{15}ClBr_2PAu$ Chlorodibromo(triethylphosphine)gold, 1238.
$C_6H_{15}ClI_2PAu$ Chlorodi-iodo(triethylphosphine)gold, 1238.
$C_6H_{15}Cl_2BrPAu$ Dichlorobromo(triethylphosphine) gold, 1238.
$C_6H_{15}Cl_2IPAu$ Dichloroiodo(triethylphosphine)gold, 1238.
$C_6H_{15}BrI_2PAu$ Bromodi-iodo(triethylphosphine)gold, 1238.
$C_6H_{15}Br_2IPAu$ Dibromoiodo(triethylphosphine)gold, 1238.

6 VI

$C_6H_{15}ClBrIPAu$ Chlorobromoiodo(triethylphosphine)gold, 1238.

C_7 Group.

C_7H_5Cl Triphenylmethyl chloride, action of formic acid on, 1333.
C_7H_6O Benzaldehyde, reaction of, with acetophenone, 1295.
C_7H_9N *p*-Toluidine, oxidation of, by peroxidase, 769.
$C_7H_{10}O_2$ Methyl sorbate, polymerisation of, by heat, 1339.
$C_7H_{12}O_2$ *iso*Pentenyl acetate, 1177.
$C_7H_{12}O_5$ 3:6-Anhydromethylgalactopyranosides, 624, 629.
Anhydromethylhexosides, 1479.
Dimethyl xylonolactone, 1505.
2-Methyl 3:6-anhydroaltrose, 322.
$C_7H_{12}O_7$ Methyl 3:6-anhydrogalactonate, 632.
$C_7H_{14}S_2$ $\alpha\alpha$-Bis(ethylthio)-Δ^{α}-propene, 1551.
$\alpha\alpha$-Bis(ethylthio)-Δ^{β}-propene, 1552.
$\alpha\beta$-Bis(ethylthio)-Δ^{α}-propene, 1555.

7 III

$C_7H_4O_2S_2$ Thiophthencarboxylic acid, 307.
$C_7H_5NCl_2$ Phenyl *iso*cyanodichloride, 193.
$C_7H_8O_2S$ *p*-Toluenesulphinic acid, potassium hydrogen salt, 862.
$C_7H_8O_3S$ 5-Hydroxy-2:4-dimethylthiophen-3-carboxylic acid, 1386.
$C_7H_9O_3N_3$ Dimethylmaleic anhydride semicarbazone, 414.
$C_7H_{10}OS$ 5-Ethoxy-2-methylthiophen, 1386.
$C_7H_{13}O_6Br$ β-Methylgalactopyranoside 6-bromohydrin, 630.
$C_7H_{14}OS$ α-*n*-Butylthiopropaldehyde, 1557.
$C_7H_{14}O_4S_2$ 1:1-Bis(ethylsulphonyl)*cyclo*propane, 1563.
$\alpha\alpha$-Bis(ethylsulphonyl)-Δ^{α}-propene, 1551.
$\alpha\beta$-Bis(ethylsulphonyl)-Δ^{α}-propene, 1556.
$C_7H_{14}O_5S_2$ $\alpha\beta$-Epoxy-$\alpha\alpha$-bis(ethylsulphonyl)propane, 1552.
$C_7H_{14}O_6S_2$ Bis(ethylsulphonyl)propionic acid, 1565.
$C_7H_{14}O_7S$ α-Methylgalactoside sulphate, barium salt, 1478.
Methylglucoside sulphate, barium salt, 1478.
$C_7H_{15}O_2N$ *n*-Amylaminoacetic acid, 1293.
$C_7H_{15}O_5N$ Dimethyl xylonamide, 1505.
$C_7H_{15}ClS_2$ γ-Chloro-$\alpha\alpha$-bis(ethylthio)propane, 1551.
$C_7H_{16}OS_2$ γ-Hydroxy-$\alpha\alpha$-bis(ethylthio)propane, 1552.
$C_7H_{16}O_5S_2$ γ-Hydroxy-$\alpha\alpha$-bis(ethylsulphonyl)propane, 1552.

7 IV

$C_7H_3O_3N_2Cl$ 2-Chloro-4-nitrobenzonitrile, 1523.
$C_7H_4O_2N_2Cl_2$ Nitrophenyl *iso*cyanodichlorides, 193.
$C_7H_6O_2NBr$ 2-Bromobenzoquinone-4-oxime methyl ether, 812.
2-Bromo-4-nitrosoanisole, 812.
3-Bromo-4-nitrotoluene, 450.
$C_7H_6O_2NI$ 2-Iodobenzoquinone-4-oxime methyl ether, 812.
2-Iodo-4-nitrosoanisole, 812.
$C_7H_6O_2NF$ 2-Fluorobenzoquinone-4-oxime methyl ether, 812.
2-Fluoro-4-nitrosoanisole, 812.
3-Fluoronitrosoanisole, 1270.
C_7H_8ONF 3-Fluoro-4-aminoanisole, 1270.
$C_7H_9O_3NS$ *p*-Toluenesulphonamide, potassium salt, 711.
$C_7H_9O_4N_3S_2$ 4-Sulphamidophenylthiourea, 1307.
$C_7H_{13}O_4BrS_2$ γ-Bromo-$\alpha\alpha$-bis(ethylsulphonyl)-Δ^{β}-propene, 1563.
$C_7H_{15}O_4ClS_2$ γ-Chloro-$\alpha\alpha$-bis(ethylsulphonyl)propane, 1562.
$C_7H_{15}O_4IS_2$ γ-Iodo-$\alpha\alpha$-bis(ethylsulphonyl)propane, 1563.
$C_7H_{17}O_2NCl$ Glycyl chloride hydrochloride, 421.

C_8 Group.

C_8H_8 Styrene, polymerisation of, catalytically, 775; thermal polymerisation of, 48.

8 II

C_8H_8O Acetophenone, reaction of, with benzaldehyde, 1295.
C_8H_9Cl α-Phenylethyl chloride, hydrolysis of, in acetone containing mercuric chloride, 679.
C_8H_9Br α-Phenylethyl bromide, hydrolysis of, in acetone containing mercuric bromide, 679.
α- and β-Phenylethyl bromides, olefin elimination from, 899.
$C_8H_{12}O$ 2:3-Dimethyl-Δ^2-*cyclo*hexenone, 416.
$C_8H_{12}O_2$ 6-Methyl-Δ^1-*cyclo*hexenecarboxylic acid, 639.
$C_8H_{12}O_3$ 4-Acetoxy*cyclo*hexanone, 13.
$C_8H_{12}O_5$ 2:4-Dimethyl 3:6-anhydrogalactonolactone, 625.

$C_6H_{14}O_3$ Quinitol acetate, 13.
$C_6H_{14}O_5$ Aldehydo 2:4-dimethyl 3:6-anhydrogalactose, 625.
2-Methyl 3:6-anhydro-α-methylaltroside, 322.
$C_6H_{14}O_6$ 2:4-Dimethyl 3:6-anhydrogalactonic acid, 625.
$C_6H_{16}O_5$ 2:3:5-Trimethyl *d*-arabofuranose, 31.
$C_6H_{16}O_6$ 3:6-Anhydrogalactose dimethylacetal, 630.
4:6-Dimethyl α-galactose, 1149.
$C_8H_{18}O$ β-Octanol, dielectric constant of, 894.

8 III

$C_8H_{10}O_2N_2$ 4-Dimethylamino-4′-acetamidoazobenzene, 368.
p-Nitrodimethylaniline, action of nitrous acid on, in hydrochloric acid, 138.
$C_6H_{10}O_2N_4$ 1:4-Bisdiazoacetyl-*n*-butane, 1305.
$C_6H_{10}O_3S$ Ethyl 3-hydroxythiophen-5-acetate, 1387.
$C_6H_{12}O_2Cl_2$ 1:4-Bischloroacetyl-*n*-butane, 1305.
$C_8H_{13}ON$ 6-Methyl-Δ^1-*cyclo*hexenecarboxylamide, 639.
$C_8H_{13}ON_3$ Crotonylideneacetone semicarbazone, 641.
$C_8H_{13}O_5N$ 2-Methyl-4:5-glucopyrano-Δ^2-oxazoline, 434.
$C_8H_{15}O_5N$ 2:4-Dimethyl 3:6-anhydrogalactonamide, 625.
$C_8H_{15}O_6N$ *N*-Acetylglucosamine, 433.
$C_8H_{16}O_2N_2$ 2:3-Dimethyl mucicdiamide, 1113.
2:3-Dimethyl saccharamide, 1044.
$C_8H_{17}ON_3$ Methyl *n*-amyl ketone semicarbazone, 99.
$C_8H_{19}O_4P$ Diethyl *n*-butyl phosphate, 1467.
$C_8H_{20}O_6S_2$ γ-Hydroxy-β-methoxy-αα-bis(ethylsulphonyl)propane, 1563.

8 IV

$C_8H_6O_2NCl$ Chloro-ω-nitrostyrenes, 449.
$C_8H_6O_2NBr$ *o*-Bromo-ω-nitrostyrene, 449.
$C_8H_7O_2N_2Cl$ *o*-Chloronitrosoacetanilide, 367.
$C_8H_7O_4N_2Cl$ Methyl 5-chloro-4-nitroanthranilate, 285.
$C_8H_9O_2ClS$ Ethyl 3-chlorothiophen-5-acetate, 1387.
α-Phenylethyl chlorosulphinite, 228.
$C_8H_{12}O_2N_2S$ N^4-Ethylsulphanilamide, 690.
$C_8H_{17}O_2ClS$ β-Octyl chlorosulphinate, 228.
$C_8H_{18}O_2ClP$ Di-*n*-butoxyphosphorus chloride, 1466.

8 V

$C_8H_{20}O_2N_2I_2S$ Cysteyl choline iodide hydriodide, 424.

C_9 Group.

9 II

$C_9H_{10}O$ Cinnamyl alcohol, action of, with ethyl acetoacetate, 1266.
Phenylvinylcarbinol, action of, with ethyl acetoacetate, 1266.
$C_9H_{12}O_8$ β-Methylbutane-αγδδ-tetracarboxylic acid, 1345.
$C_9H_{13}N$ *r*-α-Phenylpropylamine, resolution of, and its salts, 336.
$C_9H_{14}O_3$ 2-Keto-1-methyl*cyclo*hexylacetic acid, 417.
$C_9H_{14}O_7$ Methyl 2:3-dimethylmucate lactone, 1114.
Methyl 2:3-dimethylmucate γ-lactone, 1113.
Methyl 2:3-dimethyl γ-saccharolactone, 1044.
$C_9H_{16}O_5$ 2:4-Dimethyl 3:6-anhydro-α-methylaltroside, 322.
2:4-Dimethyl 3:6-anhydromethylgalactopyranosides, 624.
2:4:5-Trimethyl aldehydo 3:6-anhydrogalactose, 628.
$C_9H_{16}O_6$ Methyl 2:4-dimethyl 3:6-anhydrogalactonate, 625.
2:4:5-Trimethyl 3:6-anhydrogalactonic acid, 628.
2:3:5-Trimethyl γ-galactonolactone, 1116.
$C_9H_{16}O_7$ 2:3-Dimethyl methylglycuronoside, 1043.
$C_9H_{18}O_6$ 4:6-Dimethyl β-methylgalactoside, 1149.
4:6-Dimethyl α-methylglucoside, 455.
2:3:5-Trimethyl galactose, 1116.
$C_9H_{20}O$ Triphenylmethyl ethyl ether, action of formic acid on, 1333.
$C_9H_{20}O_4$ αβ-Dimethoxypropaldehyde diethylacetal, 1563.
$C_9H_{20}S_3$ ααβ-Tris(ethylthio)propane, 1555.
ααγ-Tris(ethylthio)propane, 1557.

9 III

$C_9H_8ON_2$ 6-Amino-4-hydroxyquinoline, and its salts, 1168.
$C_9H_8OS_2$ Thiophthienyl ethyl ketone, 306.
$C_9H_{12}O_3S$ 5-Ethoxy-2:4-dimethylthiophen-3-carboxylic acid, 1386.
Ethyl 3-hydroxy-2-methylthiophen-5-acetate, 1387.
Ethyl 3-hydroxythiophen-5-α-propionate, 1387.
$C_9H_{15}ON_3$ 6-Methyl-Δ^1-*cyclo*hexenaldehyde semicarbazone, 640.
$C_9H_{17}O_6N$ 2:3-Dimethyl β-methylgalactofururonoside, 1112.

$C_9H_{17}O_7N$ *N*-α-Hydroxypropionylglucosamine, 433.
$C_9H_{18}O_4S_2$ α-Ethylsulphonyl-β-*n*-butylsulphonyl-Δ^{α}-propene, 1558.
$C_9H_{18}O_5S$ α-Carbethoxyethyl *n*-butyl sulphite, 227.
$C_9H_{18}O_6N_2$ 2:3:5-Trimethyl mucicdiamide, 1112, 1117.
$C_9H_{19}O_6N$ 2:3:5-Trimethyl galactonamide, 1116.
$C_9H_{20}OS_2$ γ-Ethoxy-αα-bis(ethylthio)propane, 1551.
$C_9H_{20}O_2S$ α-Ethylthiopropaldehyde diethylacetal, 1557.
β-Ethylthiopropaldehyde diethylacetal, 1557.
$C_9H_{20}O_2S_2$ βγ-Dimethoxy-αα-bis(ethylthio)propane, 1563.
$C_9H_{20}O_5S_2$ γ-Ethoxy-αα-bis(ethylsulphonyl)propane, 1551, 1562.
$C_9H_{20}O_6S_3$ ααγ-Tris(ethylsulphonyl)ppropane, 1557.

9 IV

$C_9H_7O_3NS$ 3-Hydroxy-2-carbamyl-1-thionaphthen, 327.
$C_9H_7O_4N_2Cl$ 5-Chloro-4-nitro-2-acetamidobenzoic acid, 285.
$C_9H_9O_3NS$ 2-Carboxyphenylthiolacetamide, 326.
Quinolinium sulphite, 226.
$C_9H_{10}O_2NF$ 3-Fluoro-6-acetamidoanisole, 1270.
$C_9H_{11}O_3N_3S$ N^4-Formyl-N^4-ethylsulphanilamide, 690.
$C_9H_{12}O_4N_2S$ Methyl sulphanilamidoacetate, 1576.
$C_9H_{13}O_6N_2P$ Uridylic acid, and its barium salt, 748.
$C_9H_{20}O_2N_2Cl$ Glycylglycyl choline chloride hydrochloride, 421.
$C_9H_{20}O_5NCl$ 3:4:6-Trimethyl *N*-acetylglucosamine, 434.

9 V

$C_9H_4O_2NClS$ 1-Chloroacetylbenz*iso*thiazolone, 325.
$C_9H_{21}ClBr_2PAu$ Chlorodibromo(tri-*n*-propylphosphine)gold, 1238.

C_{10} Group.

$C_{10}H_{16}$ Ethyl-3:4-benzphenanthrenes, 1160.
$\Delta^{\alpha\delta}$-Pentadiene dimeride, 1178.

10 II

$C_{10}H_{10}O_4$ 2:4-Dihydroxy-3-formylpropiophenone, 246.
$C_{10}H_{12}O_3$ 2:4-Dihydroxy-3-methylpropiophenone, 246.
Methyl tropate, 843.
$C_{10}H_{12}N_2$ 4-Amino-2:3-dimethylindole, 286.
$C_{10}H_{14}O_2$ 2-Methyl-4-propylresorcinol, 246.
$C_{10}H_{15}N$ *sec.*-Butylaniline, 576.
$C_{10}H_{16}O$ Δ^3-1-Octalol, 726.
$C_{10}H_{18}O_2$ *dl*-Δ^3-*cyclo*Geranic acid, resolution of, 418.
6-Hydroxy-1:2-dimethyl*cyclo*hexylacetic lactone, 417.
Phellandric acids, 809.
$C_{10}H_{16}O_3$ α-6-Keto-1:2-dimethyl*cyclo*hexylacetic acid, 417.
$C_{10}H_{16}O_7$ Methyl 2:3:5-trimethylmucate γ-lactone, 1113, 1117.
Methyl 2:3:5-trimethylsaccharo-γ-lactone, 1045.
$C_{10}H_{18}O$ *cis*-8-Methyl-2-hydrindanol, 726.
$C_{10}H_{18}O_2$ *trans*-Decalin-2:3-diol, 726.
dl-1:2-Dimethyl*cyclo*hexylacetic acid, 417.
cis-8-Methylhydrindan-1:2-diol, 726.
$C_{10}H_{18}O_4$ α-*n*-Butyladipic acid, 640.
$C_{10}H_{18}O_6$ Methyl 2:4:5-trimethyl 3:6-anhydrogalactonate, 628.
$C_{10}H_{18}O_7$ 2:3-Dimethyl β-methylgalactopyruronoside, methyl ester, 1509.
Methyl 2:3-dimethylmethylglycuronoside, 1043.
$C_{10}H_{18}O_8$ Ethyl tetrahydroxyadipate, 865.
$C_{10}H_{20}O_6$ 2:4-Dimethyl 3:6-anhydrogalactose dimethylacetal, 626.
2:3:4-Trimethyl β-methylgalactopyranoside, 1511.

10 III

$C_{10}H_7O_3N$ Indolyl-3-glyoxylic acid, 460.
$C_{10}H_8O_2N_2$ Indolyl-3-glyoxylamide, 459.
$C_{10}H_8O_3N_2$ 6-Amino-4-hydroxyquinoline-2-carboxylic acid, 1167.
$C_{10}H_{10}O_2N_2$ *r*-3-Indolylglycine, 460.
$C_{10}H_{11}ON$ 3:3-Dimethylphthalimidine, 1088.
$C_{10}H_{11}O_4N$ β-Hydroxy-β-*o*-carbamylphenylpropionic acid, 1075.
$C_{10}H_{14}O_5N_2$ Nitrosoephedrines, 1154.
$C_{10}H_{14}O_3S$ 5-Ethoxy-2-methyl-4-ethylthiophen-3-carboxylic acid, 1386.
Ethyl 3-ethoxythiophen-5-acetate, 1387.
$C_{10}H_{14}N_4S_2$ 1:4-Bis-2′-amino-4′-thiazolyl-*n*-butane, and its dihydrochloride, 1305.
$C_{10}H_{15}ON_3$ Crotonylidene*cyclo*pentanone semicarbazone, 640.
δ-(α-Phenylpropyl)semicarbazides, hydrochlorides of, 337.
$C_{10}H_{15}O_3N$ α-Nitrocamphor, mutarotation of, in chlorobenzene solution, 1202.

$C_{10}H_{16}O_2Cl_2$ 1:6-Bischloroacetyl-*n*-hexane, 1305.
$C_{10}H_{16}O_4S$ Ethyl β-carbethoxymethylthiocrotonate, 1386.
$C_{10}H_{17}O_2Br$ α-Bromohexahydrocuminic acid, 809.
$C_{10}H_{17}O_2N_3$ 2-Keto-1-methyl*cyclo*hexylacetic acid semicarbazone, 417.
$C_{10}H_{17}O_4N$ Ethyl acetylaspartate, 1490.
$C_{10}H_{19}ON_3$ 2-*n*-Butyl*cyclo*pentanone semicarbazone, 641.
$C_{10}H_{19}O_6N$ 2:3:5-Trimethyl β-methylgalactofururonoside amide, 1112.
$C_{10}H_{19}O_7N$ Methyl 2:3:5-trimethyl mucicamide, 1118.
$C_{10}H_{20}O_6N_2$ 2:3-Dimethyl mucicbismethylamide, 1113.
$C_{10}H_{23}NS_2$ Trimethyl-γγ-bis(ethylthio)propylamine, picrate of, 1564.

10 IV

$C_{10}H_2O_2Cl_2Hg_2$ Dichloromercuri-γ-pyrone, 666.
$C_{10}H_6O_2NCl$ Succino-*m*-chlorophenylimide, 366.
$C_{10}H_6N_2Cl_2Br_2$ 2:4-Dibromobenzeneazo-βγ-dichloro-Δ^{α}-butylene, 815.
αβ-Dichlorocrotonaldehyde 2:4-dibromophenylhydrazone, 816.
$C_{10}H_6N_2Br_2Cd$ Dibromodipyridylcadmium, 1218.
$C_{10}H_6N_2I_2Cd$ Di-iododipyridylcadmium, 1217.
$C_{10}H_6ON_2Br_2$ β-Bromo-α-ketobutaldehyde 2:4-dibromophenylhydrazone, 815.
$C_{10}H_7O_2NS$ 1-Propionylbenz*iso*thiazolone, 325.
$C_{10}H_9O_2N_2Cl$ 7-Chloro-4-nitro-2:3-dimethylindole, 285.
$C_{10}H_{10}O_2NBr$ 2-Hydroxy-2-*p*-bromo-2-phenyl-5-pyrrolidone, 442.
$C_{10}H_{10}O_2N_2S$ 2-Aminonaphthalene-6-sulphonamide, 692.
$C_{10}H_{11}O_2N_3S_2$ N^4-4′-Methyl-2′-thiazolylsulphanilamide, 1307.
$C_{10}H_{11}O_3N_2S$ N^4-Acetylsulphanilamidoacetonitrile, 1575.
$C_{10}H_{11}O_4ClS$ α-Carbethoxybenzyl chlorosulphinate, 228.
$C_{10}H_{11}O_6NS$ Benzenesulphonylaspartic acid, 1491.
$C_{10}H_{12}O_4N_2S$ N^4-Acetylsulphanilamidoacetamide, 1575.
$C_{10}H_{14}O_3N_2S$ N^4-Acetyl-N^1-ethylsulphanilamide, 690.
N^4-Acetyl-N^4-ethylsulphanilamide, 690.
$C_{10}H_{14}O_4N_2S$ Ethyl sulphanilamidoacetate, and its hydrochloride, 1575.
Methyl N^1-methylsulphanilamidoacetate, 1576.
$C_{10}H_{14}O_8N_5P$ Guanosine phosphates, 750.
$C_{10}H_{15}O_2N_3S$ 1-*p*-Aminobenzenesulphonylpiperazine, 204.

10 V

$C_{10}H_9ON_2Cl_2Br$ β-Bromo-α-ketobutaldehyde-2:4-dichlorophenylhydrazone, 814.
$C_{10}H_{12}O_3NClS$ α′-Chloro-α-*p*-toluenesulphonamidoacetone, 711.

C_{11} Group.

$C_{11}H_8O_2$ α- and β-Naphthoic acids, potassium salts, 861.
$C_{11}H_{10}O_2$ γ-*p*-Tolyl-Δ^{β}-crotonolactone, 441.
$C_{11}H_{10}O_3$ γ-*p*-Methoxyphenyl-Δ^{β}-crotonolactone, 442.
$C_{11}H_{10}O_4$ 7-Methoxy-Δ^3-chromen-3-carboxylic acid, 794.
6-Methoxycoumarone-2-acetic acid, 795.
$C_{11}H_{10}N_2$ 3-Aminophenylpyridines, 1281.
$C_{11}H_{12}O_4$ 2:4-Dihydroxy-3-formylbutyrophenone, 246.
7-Methoxychroman-3-carboxylic acid, 792.
$C_{11}H_{12}O_5$ 5-Methoxy-2-formyl-β-phenoxypropionic acid, 793.
$C_{11}H_{12}O_6$ 5-Methoxy-2-carboxy-β-phenoxypropionic acid, 794.
$C_{11}H_{14}O_3$ 2:4-Dihydroxy-3-methylbutyrophenone, 246.
$C_{11}H_{14}O_4$ Methylphlor*oiso*butyrophenone, 426.
$C_{11}H_{16}O_3$ r-αγ-Dihydroxy-β-phenyl-γγ-dimethylpropane, 843.
2-Methyl-4-butylresorcinol, 246.
$C_{11}H_{17}N$ *sec.*-Butylcarbinylaniline, 576.
$C_{11}H_{18}O$ *cis*-9-Methyl-Δ^1-3-octalol, 725.
$C_{11}H_{18}O_3$ Ethyl 2-keto-1-methyl*cyclo*hexylacetate, 417.
$C_{11}H_{18}O_4$ *cis*-1-Methyl*cyclo*hexane-1-carboxylic-2-β-propionic acid, 721.
$C_{11}H_{18}O_7$ α-Carbethoxyethyl carbonate, 230.
$C_{11}H_{20}O$ *cis*-9-Methyl-3-decalol, 725.
$C_{11}H_{20}O_7$ Methyl 2:3:5-trimethyl β-methylgalactofururonoside, 1112.
$C_{11}H_{22}O_6$ 2:4:5-Trimethyl 3:6-anhydrogalactose dimethylacetal, 628.
$C_{11}H_{24}S_3$ αα-Bis(ethylthio)-β-*n*-butylthiopropane, 1558.

11 III

$C_{11}H_7ON_3$ 4-Quinolyl diazomethyl ketone, 1311.
$C_{11}H_8O_2N_2$ Nitrophenylpyridines, and their picrates, 352.
$C_{11}H_8NCl$ Chlorophenylpyridines, 356.
$C_{11}H_8NBr$ Bromophenylpyridines, 356.
$C_{11}H_8NI$ α-4-Iodophenylpyridine, 357.
$C_{11}H_9O_2N$ 3-Carboxymethylenephthalimidine, methyl ester, 1074.
Methyl indolyl-3-glyoxylate, 459.

$C_{11}H_{10}O_3N_2$ Methyl indolyl-3-glyoxylate oximes, 460.
1-Nitro-6-methoxy-2-naphthylamine, 387.
$C_{11}H_{10}O_4N_2$ Aspartic acid phenylhydantoin, 1491.
$C_{11}H_{11}O_2N$ Methyl β-*o*-cyanophenylpropionate, 1076.
$C_{11}H_{11}O_3N$ 6:7-Dimethoxycarbostyril, 1209.
6-Methoxycoumarone-2-acetamide, 795.
5-Methoxy-1-methylindole-2-carboxylic acid, 317.
Methyl indolyl-3-glycollate, 460.
$C_{11}H_{11}O_4N$ Methyl *o*-carbamylbenzoylacetate, 1074.
$C_{11}H_{11}O_3N$ 2-Hydroxy-2-phenyl-1-methyl-5-pyrrolidone, 440.
2-Hydroxy-2-*p*-tolyl-5-pyrrolidone, 441.
$C_{11}H_{13}O_3N$ 2-Hydroxy-2-*p*-methoxyphenyl-5-pyrrolidone, 442.
$C_{11}H_{18}O_4S$ Ethyl β-(α′-carbethoxyethylthio)crotonate, 1386.
$C_{11}H_{19}O_3N_3$ α-6-Keto-1:2-dimethyl*cyclo*hexylacetic acid semicarbazones, 417.
$C_{11}H_{19}O_5N$ 2-Methyl-4:5-(3′:4′:6′-trimethylglucopyrano)-Δ^2-oxazoline, 436.
$C_{11}H_{22}O_6N_2$ 2:3:5-Trimethyl mucicbismethylamide, 1118.

11 IV

$C_{11}H_8ONCl$ 4-Quinolyl chloromethyl ketone, 1311.
$C_{11}H_8O_3N_2Cl$ 7-Chloro-4-nitrodihydropentindole, 285.
$C_{11}H_9O_3NS$ 3-Hydroxy-2-acetylcarbamyl-1-thionaphthen, 327.
$C_{11}H_9O_5N_2S$ 2-(3′-Nitro-4′-hydroxybenzenesulphonamido)pyridine, 204.
$C_{11}H_{10}O_2NBr$ *cis*-ω-Bromo-6-cyano-3:4-dimethoxystyrene, 1209.
$C_{11}H_{10}O_4N_2S$ 2-(3′-Nitro-4′-aminobenzenesulphonamido)pyridine, 203.
$C_{11}H_{11}ONS$ 3-Propionamido-1-thionaphthen, 326.
$C_{11}H_{11}O_3N_2S$ 2-(3′-Amino-4′-hydroxybenzenesulphonamido)pyridine, 204.
$C_{11}H_{11}O_5NS$ *N*-*p*-Toluenesulphonylaspartic anhydride, 712.
$C_{11}H_{12}O_2NBr$ 2-Hydroxy-1-*p*-bromophenyl-2-methyl-5-pyrrolidone, 440.
$C_{11}H_{13}O_2N_2Br_2$ 2:4-Dibromo-6-piperidinonitrobenzene, 1527.
$C_{11}H_{13}O_2N_2Cl$ 2-Chloro-6-piperidinonitrobenzene, 1526.
$C_{11}H_{13}O_3N_3S$ N^4-Acetyl-N^1-methylsulphanilamidoacetonitrile, 1576.
$C_{11}H_{14}O_4N_4S$ α-Ethylthiopropaldehyde 2:4-dinitrophenylhydrazone, 1557.
β-Ethylthiolpropaldehyde 2:4-dinitrophenylhydrazone, 1557.
$C_{11}H_{15}O_4NS$ Benzenesulphonyl-α-ethylaminopropionic acid, 1293.
$C_{11}H_{15}O_4N_3S$ N^4-Acetyl-N^1-methylsulphanilamidoacetamide, 1576.
$C_{11}H_{16}O_4N_2S$ Ethyl N^1-methylsulphanilamidoacetate, 1576.
Methyl N^1-ethylsulphanilamidoacetate, 1576.

11 V

$C_{11}H_{10}ONBrS$ 2-Bromo-3-propionamido-1-thionaphthen, 326.
$C_{11}H_{12}O_2NClS$ Ethylquinolinium chlorosulphinate, 226.

C_{12} Group.

$C_{12}H_{20}$ βγ-Dimethylbutadiene dimeride, 1169.
cis-1:9-Dimethyloctalin, 1131.

12 II

$C_{12}H_8N_2$ α-4-Cyanophenylpyridine, 357.
$C_{12}H_{10}O_3$ 1:2:3:4-Tetrahydronaphthalene-2:3-dicarboxylic anhydrides, 1324.
$C_{12}H_{12}O_3$ 2-Hydroxymethyl-1:2:3:4-tetrahydronaphthalene-3-carboxylic lactones, 1325.
$C_{12}H_{12}O_4$ Ethyl 6-methoxycoumarone-2-carboxylate, 794.
1:2:3:4-Tetrahydronaphthalene-2:3-dicarboxylic acid, 1321.
$C_{12}H_{14}O_3$ γ-Acetyl-α-phenylbutyric acid, 849.
1-Methyl-2-propyl*cyclo*hexane-3:4-dicarboxylic anhydride, 1344.
γ-*p*-Toluoyl-*n*-butyric acid, 452.
$C_{12}H_{16}O_3$ Calythrone, and its salts, 412.
$C_{12}H_{16}O_4$ 1-Methylpropenyl*cyclo*hexenedicarboxylic acids, 1344.
$C_{12}H_{17}Cl$ δ-*p*-Tolyl-*n*-amyl chloride, 452.
$C_{12}H_{18}O$ δ-*p*-Tolyl-*n*-amyl alcohol, 452.
$C_{12}H_{18}O_2$ *trans*-Δ^2-Octalyl acetate, 726.
$C_{12}H_{19}N$ 2-Methylpentylaniline, 576.
$C_{12}H_{20}O_3$ Ethyl 2-keto-3:4-dimethyl*cyclo*hexylacetate, 417.
$C_{12}H_{20}O_4$ 1-Methyl-2-propyl*cyclo*hexane-3:4-dicarboxylic acid, 1344.
4-Methyl-2-*n*-propyl*iso*phthalic acid, 1346.
$C_{12}H_{22}O$ Dimethyldecalols, 1131.
$C_{12}H_{22}O_6$ Methyl 2:3:4:5-tetramethylmucate, 1114.
$C_{12}H_{22}O_{11}$ Sucrose, action of bacteria on, 237.
$C_{12}H_{27}N$ Di-*n*-hexylamine, and its hydrochloride, 1314.

12 III

$C_{12}H_7N_2Cl$ 4-Chloro-5:6:3′:2′-pyridoquinoline, 1168.
$C_{12}H_9ON_3$ 4-Hydroxy-5:6:3′:2′-pyridoquinoline, 1168.
α-Naphthoyldiazomethane, 1310.

$C_{12}H_8O_4N_2$ 3:4′-Dinitrodiphenyl, 211.
1-Nitro-4-phenylnaphthalene, 211.
$C_{12}H_8Cl_2As_2$ Arsanthren dichloride, 1188.
$C_{12}H_9O_2N$ α-Phenylpyridine-4-carboxylic acid, 358.
$C_{12}H_{10}O_3N_2$ Nitro-2-methoxyphenylpyridines, 360.
$C_{12}H_{10}O_7N_2$ Ethyl 6-nitro-4-hydroxyquinoline-2-carboxylate, 1168.
$C_{12}H_{11}ON$ Methoxyphenylpyridines, and their picrates, 359.
$C_{12}H_{11}O_3N$ Ethyl 4-hydroxyquinoline-2-carboxylate, 1168.
Methyl 1-methylindolyl-3-glyoxylate, 460.
$C_{12}H_{11}O_4N$ 6-Cyano-3:4-dimethoxycinnamic acid, 1209.
$C_{12}H_{11}O_4N_3$ Dimethylmaleic anhydride *p*-nitrophenylhydrazone, 414.
$C_{12}H_{12}O_6Br_2$ αβ-Dibromo-6-carboxy-3:4-dimethoxyphenylpropionic acid, 1209.
$C_{12}H_{13}O_2N$ 2-Acetyl-3:3-dimethylphthalimidine, 1088.
Methyl-6-methoxy-4-quinolylcarbinol, and its hydrochloride, 1313.
$C_{12}H_{13}O_2N_3$ Nitropiperidinobenzonitriles, 1524.
$C_{12}H_{13}O_4N_3$ 3:6-Dinitro-2-hydroxy-1-acetyl-2:3-dimethyl-2:3-dihydroindole, 286.
$C_{12}H_{13}N_2Cl$ Chloropiperidinobenzonitriles, 1524.
$C_{12}H_{15}O_2N$ 2-Hydroxy-2-phenyl-1-ethyl-5-pyrrolidine, 440.
2-Hydroxy-2-*p*-tolyl-1-methyl-5-pyrrolidone, 441.
$C_{12}H_{15}O_3N$ 2:3-Dihydroxy-1-acetyl-2:3-dimethyl-2:3-dihydroindole, 286.
2-Hydroxy-2-*p*-methoxyphenyl-1-methyl-5-pyrrolidone, 442.
$C_{12}H_{15}O_4N_3$ 2:4-Dihydroxy-3-formylbutyrophenone semicarbazone, 246.
$C_{12}H_{15}O_5N$ 3-Dicarbethoxymethylenephthalimidine, 1074.
$C_{12}H_{15}O_5N_3$ 5-Methoxy-2-formyl-β-phenoxypropionic acid semicarbazone, 794.
$C_{12}H_{16}O_2N_2$ Nitrosoacetylephedrines, 1154.
$C_{12}H_{16}O_4N_4$ Dimethylmaleic anhydride 2:4-dinitrophenylhydrazone, 414.
$C_{12}H_{17}O_2N$ Acetylephedrines, and their salts, 1154.
$C_{12}H_{18}O_2N_4$ Phenylazo-bis-acetoxime, metallic salts, 654.
$C_{12}H_{18}O_2N_2$ Calythrone dioxime anhydride, 414.
$C_{12}H_{18}N_4S_2$ 1:6-Bis-2′-amino-4′-thiazolyl-*n*-hexane, and its dihydrochloride, 1305.
$C_{12}H_{19}ON_3$ *cis*-9-Methyl-Δ^1-3-octalone semicarbazone, 725.
$C_{12}H_{19}NS$ Thio-*p*-cresol, piperidine salt, 1528.
$C_{12}H_{20}O_2Cl_2$ 1:12-Dichloro-2:11-diketododecane, 1318.
$C_{12}H_{21}O_2N$ Valeroidine, and its salts, 1156.
$C_{12}H_{23}O_5N$ β-Methyl 3:4:6-trimethyl *N*-acetylglucosaminide, 434.
$C_{12}H_{27}O_3P$ Tri-*n*-butyl phosphite, 1466.
$C_{12}H_{27}O_4P$ Tri-*n*-butyl phosphate, 1467.

12 IV

$C_{12}H_8O_3NBr$ Bromonitroacenaphthenes, 450.
Bromonitrodiphenyls, 449.
$C_{12}H_8O_4N_2V$ *o*-Hydroxybenzeneazoresorcinol, vanadyl complex, 1068.
$C_{12}H_9O_3N_4Br$ 2-Bromobenzoquinone-4-oxime-1-*p*-nitrophenylhydrazone, 812.
$C_{12}H_9O_3N_4I$ 2-Iodobenzoquinone-4-oxime-1-*p*-nitrophenylhydrazone, 812.
$C_{12}H_9O_3N_4F$ 2-Fluorobenzoquinone-4-oxime-1-*p*-nitrophenylhydrazone, 812.
$C_{12}H_{10}ON_2Cl_4$ αβ-Dichlorocrotonaldehyde *N*-acetyl-2:4-dichlorophenylhydrazone, 816.
$C_{12}H_{12}O_3N_2S$ 2-Acetamidonaphthalene-6-sulphonamide, 692.
$C_{12}H_{13}O_5NS$ 5-Keto-1-*p*-toluenesulphonylpyrrolidine-2-carboxylic acid, 709.
$C_{12}H_{14}O_4N_2S$ 5-Keto-1-*p*-toluenesulphonylpyrrolidine-2-carboxyamide, 711.
$C_{12}H_{15}O_2NS$ Methyl *N*-*p*-toluenesulphonylaspartate, 712.
$C_{12}H_{15}O_2N_2S$ N^4-Acetyl-N^1-ethylsulphanilamidoacetonitrile, 1576.
$C_{12}H_{15}O_3N_2S_2$ N^4-5′-β-Hydroxyethyl-4′-methyl-2′-thiazolylsulphanilamide, 1307.
$C_{12}H_{15}O_5NS$ *N*-*p*-Toluenesulphonylglutamic acid, 709.
dl-*p*-Toluenesulphonylglutamic acid, 711.
$C_{12}H_{16}O_5N_2S$ Ethyl acetylsulphanilamidoacetate, 1575.
N-*p*-Toluenesulphonyl*iso*glutamine, 711.
$C_{12}H_{17}O_4NS$ Benzenesulphonylbutylaminoacetic acids, 1292.
Benzenesulphonyl-α-*n*-propylaminopropionic acid, 1293.
$C_{12}H_{17}O_4N_2S$ N^4-Acetyl-N^1-ethylsulphanilamidoacetamide, 1576.
$C_{12}H_{16}O_2NI$ Benzoyl choline iodide, 422.
$C_{12}H_{18}O_4N_2S$ Ethyl N^1-ethylsulphanilamidoacetate, 1576.
$C_{12}H_{30}Cl_6P_2Hg_4$ Bistriethylphosphinetetrakismercuric chloride, 1221.
$C_{12}H_{30}Cl_8As_2Hg_4$ Bistriethylarsinetetrakismercuric chloride, 1222.
$C_{12}H_{30}Br_4P_2Cd_2$ Dibromobistriethylphosphine-μ-dibromodicadmium, 1217.
$C_{12}H_{30}Br_4P_2Hg_2$ Dibromobistriethylphosphine-μ-dibromodimercury, 1219.
$C_{12}H_{30}Br_4As_2Cd_2$ Dibromobistriethylarsine-μ-dibromodicadmium, 1218.
$C_{12}H_{30}Br_6P_2Hg_3$ Bistriethylphosphinetrimercuric bromide, 1221.
$C_{12}H_{30}Br_8P_2Hg_4$ Bistriethylphosphinetetrakismercuric bromide, 1221.
$C_{12}H_{30}I_2P_2Cd$ Di-iodobistriethylphosphinecadmium, 1216.
$C_{12}H_{30}I_2As_2Cd$ Di-iodobistriethylarsinecadmium, 1217.
$C_{12}H_{30}I_4P_2Cd_2$ Di-iodobistriethylphosphine-μ-di-iododicadmium, 1217.
$C_{12}H_{30}I_4P_2Hg$ Di-iodobistriethylphosphine-μ-di-iodomercury, 1219.
$C_{12}H_{30}I_4As_2Cd_2$ Di-iodobistriethylarsine-μ-di-iododicadmium, 1218.
$C_{12}H_{30}I_4As_2Hg_2$ Di-iodobistriethylarsine-μ-di-iododimercury, 1220.
$C_{12}H_{30}I_6P_2Hg_3$ Bistriethylphosphinetrismercuric iodide, 1221.
$C_{12}H_{30}I_6As_2Hg_3$ Bistriethylarsinetrismercuric iodide, 1221.

12 V

$C_{12}H_8O_7N_2SV$ 2′-Hydroxy-5′-sulphobenzeneazoresorcinol, vanadyl complex, salts of, 1069.
$C_{12}H_{10}ON_2Cl_2Br_2$ $\alpha\beta$-Dichlorocrotonaldehyde *N*-acetyl-2:4-dibromophenylhydrazone, 816.
$C_{12}H_{10}ON_2Cl_4Br_2$ $\alpha\alpha\beta\beta$-Tetrachlorobutaldehyde *N*-acetyl-2:4-dibromophenylhydrazone, 816.

C_{13} Group.

$C_{13}H_8O_3$ 7-Hydroxy-3:4-benzocoumarin, 1395.
$C_{13}H_8Br_2$ 3:7-Dibromofluorene, 450.
$C_{13}H_{10}O_3$ Phenyl carbonate, action of sodium on, 215.
$C_{13}H_{10}O_6$ 5-Hydroxy-6-propionylcoumarin-3-carboxylic acid, 246.
$C_{13}H_{11}Cl$ Benzhydryl chloride, hydrolysis of, in acetone, 920.
$C_{13}H_{12}O_2$ *dl*-β-Naphthylmethylcarbinyl formate, 679.
$C_{13}H_{12}O_3$ 6-Hydroxy-3:4-*cyclo*hexenocoumarin, 1123.
$C_{13}H_{13}Cl$ 1-Chloromethyl-2:3-dimethylnaphthalene, 302.
1-Chloromethyl-3:4-dimethylnaphthalene, 299.
$C_{13}H_{16}O_2$ δ-*p*-Tolyl-Δ^γ-hexenoic acid, 452.
$C_{13}H_{16}O_3$ Methyl γ-acetyl-α-phenylbutyrate, 849.
Methyl γ-*p*-toluoyl *n*-butyrate, 452.
$C_{13}H_{16}O_4$ Methyl-β-*o*-tolylethylmalonic acid, 1241.
$C_{13}H_{18}O_2$ δ-*p*-Tolyl-*n*-hexoic acid, 452.
$C_{13}H_{18}O_4$ Bœckeol, 425, 1208.
Methylphloro*iso*butyrophenone dimethyl ether, 426.
$C_{13}H_{21}N$ *n*-Hexylbenzylamine, and its hydrochloride, 1313.

13 III

$C_{13}H_8OBr_2$ 3:7-Dibromofluorenone, 450.
$C_{13}H_9O_2N$ 4-Nitrodiphenyl-4′-carboxylic acid, 1382.
$C_{13}H_9NBr_2$ 3:7-Dibromo-2-aminofluorene, 450.
$C_{13}H_8N_2Cl$ Chloromethyl-5:6:3′:2′-pyridoquinolines, 1166.
$C_{13}H_{10}ON_2$ Hydroxymethyl-5:6:3′:2′-pyridoquinolines, 1166.
$C_{13}H_{10}O_2N_2$ 3-Cyanocarbethoxymethylenephthalimidine, 1078.
$C_{13}H_{10}N_2S$ 1-Anilinobenzthiazole, 193.
$C_{13}H_{11}OBr$ 4′-Bromo-2-methoxydiphenyl, 1384.
2-α-Bromopropionylnaphthalene, 301.
$C_{13}H_{11}OI$ 4′-Iodo-2-methoxydiphenyl, 1384.
$C_{13}H_{11}O_2N$ Methyl α-phenylpyridine-4-carboxylate, 357.
$C_{13}H_{11}O_2N_2$ α-4-Nitrosoacetamidophenylpyridine, 1282.
Nitrosocarbanilide, 367.
$C_{13}H_{11}O_2Br$ 7-Methoxy-1-naphthacyl bromide, 1311.
$C_{13}H_{11}O_3N$ 4′-Nitro-2-methoxydiphenyl, 1384.
$C_{13}H_{11}O_4N$ Methyl indolyl-3-glyoxylate, acetyl derivative, 459.
$C_{13}H_{11}O_4N_2$ 1-Nitro-7-methoxy-*N*-nitrosoaceto-2-naphthalide, 387.
$C_{13}H_{12}ON_2$ 3-Acetamidophenylpyridines, 1281.
4-Acetamidophenylpyridines, 1282.
$C_{13}H_{12}O_2N_2$ 3-Keto-10-methoxy-1-methyl-3:4-dihydro-4-carboline, 318.
$C_{13}H_{12}O_4N_2$ Nitro-6-methoxyaceto-2-naphthalides, 387.
Nitro-7-methoxyaceto-2-naphthalides, 386.
$C_{13}H_{13}ON$ 4′-Amino-2-methoxydiphenyl, 1384.
γ-4-Ethoxyphenylpyridine, 356.
$C_{13}H_{13}O_6N_3$ 6:10-Dinitro-9-hydroxy-8-acetyltetrahydropentindole, 285.
$C_{13}H_{14}O_4N_2$ γ-4-Nitro-2-acetamidobenzoylbutyric acid, 285.
$C_{13}H_{17}O_2N$ 2-Hydroxy-2-phenyl-1-*n*-propyl-5-pyrrolidone, 441.
$C_{13}H_{17}O_3N_3$ γ-Acetyl-α-phenylbutyric acid semicarbazone, 850.
γ-*p*-Toluoyl-*n*-butyric acid semicarbazone, 452.
$C_{13}H_{18}O_2N_2$ Phenylcarbamidobutylaminoacetic acids, 1292.
$C_{13}H_{19}ON_3$ Acetone-3-(α-phenylpropyl)semicarbazones, 337.
$C_{13}H_{19}O_3N_3$ 2-Acetoxy-5-methoxyvalerophenone semicarbazone, 1121.
$C_{13}H_{20}ON_2$ *N*-β-Diethylaminoethylformanilide, 691.
$C_{13}H_{20}O_2N_4$ Tolylazo-bis-acetoximes, metallic derivatives, 654.

13 IV

$C_{13}H_9O_2NBr$ 2-Bromo-3-nitrofluorene, 449.
$C_{13}H_9ONS_2$ Thiophthencarboxyanilide, 307.
$C_{13}H_9ON_2Cl_3$ Trichloro-10-methoxy-1-methyl-4-carboline, 318.
$C_{13}H_9O_3N_2Cl_2$ Dichloronitrosocarbanilides, 367.
$C_{13}H_9O_2NV$ Salicylidene-*o*-aminophenol, vanadyl complex, 1069.
$C_{13}H_9O_4N_4Br$ *o*-Bromobenzaldehyde 2:4-dinitrophenylhydrazone, 449.
$C_{13}H_{11}ON_2Cl$ 3-Chloro-10-methoxy-1-methyl-4-carboline hydrochloride, 318.
$C_{13}H_{11}O_4NS$ 3-Acetoxy-2-acetylcarbamyl-1-thionaphthen, 327.
$C_{13}H_{12}O_5N_4S$ 2-(3′-Nitro-4′-acetamidobenzenesulphonamido)pyridine, 203.
$C_{13}H_{12}O_6N_3Cl$ 5-Chloro-6:10-dinitro-9-hydroxy-8-acetyltetrahydropentindole, 285.

$C_{13}H_{13}O_6N_2Cl$ γ-5-Chloro-4-nitro-2-acetamidobenzoylbutyric acid, 285.
$C_{13}H_{15}O_4NS$ 5-Keto-1-*p*-toluenesulphonyl-2-acetylpyrrolidine, 710.
$C_{13}H_{17}O_5NS$ α-Toluenesulphonamido-δ-ketohexoic acid, 710.
$C_{13}H_{18}O_4N_4S$ α-*n*-Butylthiopropaldehyde 2:4-dinitrophenylhydrazone, 1558.
$C_{13}H_{19}O_4NS$ Benzenesulphonyl-*n*-amylaminoacetic acid, 1293.
$C_{13}H_{19}O_4N_2S$ Ethyl 4-(*p*-aminobenzenesulphonyl)piperazine-1-carboxylate, 204.
$C_{13}H_{20}O_3N_2S$ Benzenesulphonyl-*n*-amylaminoacetamide, 1294.

13 V

$C_{13}H_9O_4NCl_2S$ 2:4-Dichloro-6-*p*-tolylthionitrobenzene, 1527.
$C_{13}H_9O_4NBr_2S$ 2:4-Dibromo-6-*p*-tolylthionitrobenzene, 1527.
$C_{13}H_9O_4NCl_2S$ 2:4-Dichloro-6-*p*-toluenesulphonylnitrobenzene, 1527.
$C_{13}H_9O_4NBr_2S$ 2:4-Dibromo-6-*p*-toluenesulphonylnitrobenzene, 1527.
$C_{13}H_{10}O_2NClS$ 2-Chloro-6-*p*-tolylthionitrobenzene, 1526.
$C_{13}H_{10}O_6N_3ClS$ *p*-Toluenesulphon-2-chloro-4:6-dinitroanilide, 1523.
$C_{13}H_{11}O_2N_2ClS$ 5-Chloro-2-nitro-3-(*p*-tolylthio)aniline, 1528.
$C_{13}H_{14}O_4NClS$ 5-Keto-1-*p*-toluenesulphonyl-2-chloroacetylpyrrolidine, 710.
$C_{13}H_{14}O_4NBrS$ Bromo-5-keto-1-*p*-toluenesulphonyl-2-acetylpyrrolidine, 710.
$C_{13}H_{16}O_5NBrS$ Bromo-α-toluenesulphonamido-δ-ketohexoic acid, 710.

C_{14} Group.

$C_{14}H_{16}$ 1:2:3:4-Tetramethylnaphthalene, 302.
$C_{14}H_{32}$ δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-methyl-$\Delta^{\alpha\gamma}$-butadiene, 1240.

14 II

$C_{14}H_8O_5$ 1:3:8-Trihydroxyanthraquinone, 428.
$C_{14}H_{10}O_3$ 6-Hydroxy-5′-methyl-3:4-benzocoumarin, 1120.
$C_{14}H_{10}O_4$ 2:4-Dihydroxy-3-formylbenzophenone, 246.
$C_{14}H_{11}N$ 2-Cyano-5-methyldiphenyl, 1120.
$C_{14}H_{11}Br$ 1-Bromo-3:4-dimethylnaphthalene, 299.
$C_{14}H_{12}O_3$ 2-Hydroxy-5-benzoyloxytoluene, 330.
$C_{14}H_{12}O_5$ 5-Hydroxy-3-acetyl-6-propionylcoumarin, 246.
$C_{14}H_{12}O_6$ 5-Hydroxy-6-butyrylcoumarin-3-carboxylic acid, 246.
$C_{14}H_{14}O_2$ 4-Benzyl-2-methylresorcinol, 247.
3:4-Dimethylnaphthyl-1-acetic acid, 299.
d-β-Naphthylmethylcarbinyl acetate, 678.
$C_{14}H_{14}O_3$ 6-Hydroxy-5′-methyl-3:4-*cyclo*hexenocoumarin, 1123.
$C_{14}H_{14}S_2$ Dibenzyl disulphide, reaction of, with sulphuryl chloride, 641.
$C_{14}H_{15}Cl$ 1-Chloromethyl-2:3:4-trimethylnaphthalene, 302.
β-1-(3:4-Dimethylnaphthyl)ethyl chloride, 299.
$C_{14}H_{16}O$ β-1-(3:4-Dimethylnaphthyl)ethyl alcohol, 299.
2-*o*-Tolylidene*cyclo*hexanone, 638.
$C_{14}H_{16}O_3$ 7-Hydroxy-4:8-dimethyl-6-propylcoumarin, 246.
$C_{14}H_{16}O_4$ Eucarvone–maleic anhydride adduct, 1163.
$C_{14}H_{18}O_2$ Ethyl γ-acetyl-α-phenylbutyrate, 850.
2:4:4:7-Tetramethylchroman-2-carboxylic acid, 1105.
$C_{14}H_{18}O_4$ 2-Acetoxy-5-methoxyvalerophenone, 1121.
$C_{14}H_{20}O$ Ethyl *dl*-γ-*p*-tolyl-*n*-valerate, 452.
$C_{14}H_{20}O_3$ 2-Keto-5-hydroxy-αβ-di*cyclo*hexylidene-ethane, 14.
Methyl δ-*p*-tolyl-*n*-hexoate, 452.
$C_{14}H_{22}O_5$ Ethyl 6-keto-5-carbethoxy-2-methyl*cyclo*hexylacetate, 417.
$C_{14}H_{23}N$ Heptylbenzylamine, and its hydrochloride, 1314.
$C_{14}H_{24}O$ δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-methyl-Δ^γ-buten-β-ol, 1240.
$C_{14}H_{26}O_2$ 2:13-Diketotetradecane, 1318.

14 III

$C_{14}H_{10}OS_2$ Dithiobenzoyl oxide, 832.
$C_{14}H_{10}O_4S_2$ Dibenzoyldisulphone, 832.
$C_{14}H_{10}O_6S$ 6-Tosyl β-methylgalactopyranoside, 629.
$C_{14}H_{11}O_3N$ 4′-Nitro-2-acetoxydiphenyl, 1384.
$C_{14}H_{12}O_2N_2$ 3-Nitrosoacetamidodiphenyl, 371.
$C_{14}H_{13}O_4N$ Ethyl phthalimidyl-3-acetoacetate, 1073.
$C_{14}H_{14}ON_2$ 4-Amino-2:5-toluquinone-2-*p*-tolylimine, 771.
$C_{14}H_{14}O_2N_2$ Diacetyl-2:6-naphthylenediamine, 382.
$C_{14}H_{14}O_2N_2$ 4-(4′-Methoxyphenoxy)benzhydrazide, 1102.
$C_{14}H_{14}O_4N_2$ Ethyl 6-acetamido-4-hydroxyquinoline-2-carboxylate, 1167.
$C_{14}H_{16}O_4N_4$ 6-Methyl-Δ^1-*cyclo*hexenaldehyde 2:4-dinitrophenylhydrazone, 640.
$C_{14}H_{16}O_{10}Cl_2$ Tetra-acetoxyadipyl dichloride, 865.
$C_{14}H_{17}ON$ Dimethylaminomethyl-1-naphthylcarbinol, 1310.
6-Methyl-Δ^1-*cyclo*hexenanilide, 639.
$C_{14}H_{18}O_3N_2$ Methyl γ-acetyl-α-phenylbutyrate semicarbazone, 850.
$C_{14}H_{19}O_4N$ 2:4-Dimethyl 3:6-anhydrogalactose anilide, 625.
$C_{14}H_{19}O_5N$ 2-Methyl-4:5-(3′:4′:6′-tri-*O*-acetylglucopyrano)-Δ^2-oxazoline, 436.

$C_{14}H_{20}O_6N_2$ 4:6-Benzylidene hydrazino-α-methylaltrosides, 321.
$C_{14}H_{22}O_2N_4$ Phenylazo-bis-methylethylketoxime, metallic salts, 655.
$C_{14}H_{22}O_6S$ Ethyl α-(α′-carbethoxyethylthio)ethylidenemalonate, 1386.
$C_{14}H_{32}N_4S_2$ 1:8-Bis-2′-amino-4′-thiazolyl-*n*-octane, and its dihydrochloride, 1306.
$C_{14}H_{24}O_2Cl_2$ 1:14-Dichloro-2:13-diketotetradecane, 1318.
$C_{14}H_{28}O_3S$ *l*-Menthyl butyl sulphite, 227.

14 IV

$C_{14}H_9O_4NS$ *p*-Nitrobenzyl thiophthencarboxylate, 307.
$C_{14}H_{10}ON_2S_2$ Bis(phenylthiocarbimide) oxide, 193.
$C_{14}H_{10}O_2N_2S$ Nitro-*p*-tolylthiobenzonitriles, 1524.
$C_{14}H_{10}O_4N_2S$ Nitro-*p*-toluenesulphonylbenzonitriles, 1524.
$C_{14}H_{10}NClS$ Chloro-*p*-tolylthiobenzonitriles, 1523.
$C_{14}H_{11}O_4ClS$ 4-Chloro-2-*p*-toluenesulphonylbenzoic acid, 1523.
$C_{14}H_{11}O_3NS$ 5-Keto-1-*p*-toluenesulphonylpyrrolidine-2-carboxylic–acetic anhydride, 709.
$C_{14}H_{16}ON_2S$ *N*-Methyl-*N*-β-hydroxyethyl-*N*′-α-naphthylthiourea, 289.
$C_{14}H_{15}O_3N_2As$ 4-Dimethylaminoazobenzene-4′-arsonic acid, 577.
4-Ethylaminoazobenzene-4′-arsonic acid, 577.
$C_{14}H_{17}N_2IS$ 2-*m*-Dimethylaminostyrylthiazole methiodide, 59.
$C_{14}H_{20}O_4N_4S$ Aminoiminosuccinonitrile δ-camphorsulphonate, 1207.
$C_{14}H_{21}O_4NS$ Benzenesulphonyl-*n*-hexylaminoacetic acid, 1294.
$C_{14}H_{22}O_2NCl$ Methyl-β-benzoyloxyethyldiethylammonium chloride, 421.
$C_{14}H_{22}O_2NI$ Methyl-β-benzoylethyldiethylammonium iodide, 421.
$C_{14}H_{22}O_3N_2I$ Phenylalanyl choline iodide hydriodide, 425.
$C_{14}H_{24}O_3NCl$ Menthyl *d*-β-chloro-β-nitrosobutyrate, 784.
$C_{14}H_{21}O_2N_2S$ N^4-β-Diethylaminoethyl-N^1-dimethylsulphanilamide, and its hydrochloride, 689.

14 V

$C_{14}H_8ON_2Br_2S_2$ Bis-(*p*-bromophenylthiocarbimide, 193.
$C_{14}H_{10}O_2NClS$ Chloro-*p*-toluenesulphonylbenzonitriles, 1523.
$C_{14}H_{12}O_3NClS$ 4-Chloro-2-*p*-toluenesulphonylbenzamide, 1523.
$C_{14}H_{14}O_2NBrS$ 5-Bromo-*p*-toluenesulphonamidotoluene, 450.
$C_{14}H_{15}O_4N_2ClS$ 3-Chloro-1-methyl-4-carboline methosulphate, 316.

C_{15} Group.

$C_{15}H_{22}$ *dl*-α-Curcumene, 453.

15 II

$C_{15}H_{12}O_4$ 2:4-Dihydroxy-3-formylphenyl benzyl ketone, 247.
$C_{15}H_{14}O_3$ 2:6-Dihydroxy-*m*-tolyl benzyl ketone, 247.
*iso*Dunniol, 1498.
Dunnione, 1493.
$C_{15}H_{14}O_4$ Acetoxy-3:4-*cyclo*hexenocoumarins, 1124.
$C_{15}H_{14}O_9$ Methyl 3-oxalylbenzene-1:2:4-tricarboxylate, 1345.
$C_{15}H_{14}O_9$ Methyl 3-oxalylbenzene-1:2:4-tricarboxylate, 1345.
$C_{15}H_{16}O_2$ 2-Methyl-4-β-phenylethylresorcinol, 247.
$C_{15}H_{16}O_3$ Dihydro*allo*dunnione, 1498.
$C_{15}H_{16}O_4$ Hydroxyhydro*iso*dunniol, 1497.
$C_{15}H_{17}N$ *pp*′-Dimethylbenzhydrylamine, and its picrate, 978.
$C_{15}H_{12}O_5$ Hydroxy-2:2-dimethyl-3′:4′:5′:6′-tetrahydrodibenzopyrans, 1124.
$C_{15}H_{18}O_4$ Dihydrohydroxyhydro*allo*dunnione, 1498.
2′:4′-Dimethoxyphenyl-Δ^1-*cyclo*hexene-2-carboxylic acid, 1395.
$C_{15}H_{20}O_5$ 2-Acetoxy-4:6-dimethoxy-3-methyl*iso*butyrophenone, 1208.
$C_{15}H_{24}O$ *dl*-β-Hydroxy-ζ-*p*-tolyl-β-methylheptane, 453.
$C_{15}H_{30}O_3$ 13-Methyl-13-hydroxytetradecoic acid, 69.

15 III

$C_{15}H_9O_2N_3$ 6:7-Phthalylindazole, 368.
$C_{15}H_9N_2Cl_3$ 3:10-Dichloro-5:6-benz-4-carboline, 317.
$C_{15}H_9N_2Cl$ 3-Chloro-5:6-benz-4-carboline, 316.
$C_{15}H_{11}OCl$ 4-Chloro-ω-benzylideneacetophenone, 1295.
$C_{15}H_{11}O_2N$ 5-Phenyl-3-*o*-hydroxyphenyl*iso*oxazole, 251.
$C_{15}H_{12}O_2Br_2$ *o*-Hydroxyphenyl αβ-dibromo-β-phenylethyl ketone, 250.
$C_{15}H_{12}O_9N_6$ Malonaldehyde bis-2:4-dinitrophenylhydrazone, 1557.
$C_{15}H_{13}O_3N_3$ Nitroso-*p*-benzamidoacetanilide, 368.
$C_{15}H_{15}O_3Br$ Bromo-β-*iso*dunnione, 1497.
$C_{15}H_{14}O_2N_2$ *p*-Benzamidoacetanilide, 368.
$C_{15}H_{14}O_6N_2$ Diacetyl-1-nitro-7-methoxy-2-naphthylamine, 386.
$C_{15}H_{14}O_6S$ *allo*Dunnionesulphonic acid, 1498.
$C_{15}H_{15}O_2N$ 4′-Acetamido-2-methoxydiphenyl, 1384.
$C_{15}H_{15}O_3N_3$ Nitroso-4:4′-dimethylcarbanilide, 367.
$C_{15}H_{15}O_2N$ Diacetyl-7-methoxy-2-naphthylamine, 383.
$C_{15}H_{15}O_4N$ 3-Dicarbethoxymethylenephthalimidine, 1079.
$C_{15}H_{16}O_4N_2$ 1-Imino-3-dicarbethoxymethylenephthalimidine, and its hydrochloride, 1078.

$C_{15}H_{17}O_2N_3$ 6-Nitro-2-piperidino-4-methylquinoline, 1166.
$C_{15}H_{17}O_3N$ Ethyl α-cyano-γ-acetyl-α-phenylbutyrate, 849.
$C_{15}H_{20}ON_2$ Diethylaminomethyl-4-quinolylcarbinol, dipicrate of, 1312.
$C_{15}H_{20}O_5N_2$ Ethyl phenylcarbamidoaspartate, 1490.
$C_{15}H_{21}O_6N$ 3-Keto-2-methyl-5:6-(3′:4′:6′-tri-*O*-acetylglucopyrano)tetrahydro-1:4-oxazine, 437.
$C_{15}H_{22}O_4N_2$ *dl*-α-Curcumene nitrosate, 453.
$C_{15}H_{22}O_5N_2$ 2:3:5-Trimethylgalactonic phenylhydrazide, 1117.
$C_{15}H_{22}O_6N_2$ 2:3-Dimethyl methylglycuronoside phenylhydrazide, 1044.
$C_{15}H_{22}O_6S$ 3-*p*-Toluenesulphonyl 2-methyl α-methylaltroside, 322.
$C_{15}H_{23}ON_3$ *dl*-Methyl δ-*p*-tolylamyl ketone semicarbazone, 453.
$C_{15}H_{24}O_2N_4$ *m*-Tolylazo-bis-methylethylketoxime, and its metallic derivatives, 655.
$C_{15}H_{24}O_5N_2$ 2:3:5-Trimethyl *l*-rhamnonic phenylhydrazide, 1051.
$C_{15}H_{25}O_4N$ Acetylvaleroidine, and its hydrobromide, 1156.

15 IV

$C_{15}H_9ON_2Cl$ 10-Chloro-3-keto-3:4-dihydro-5:6-benz-4-carboline, 317.
$C_{15}H_9O_4N_2Cl$ 6-Chloro-3-*o*-nitrophenylindole-2-carboxylic acid, 317.
$C_{15}H_{10}O_2N_2S$ 2-Nitro-3-benzamido-1-thionaphthen, 326.
$C_{15}H_{11}ONBr_2$ 3:7-Dibromo-2-acetamidofluorene, 450.
$C_{15}H_{11}O_2NS$ 1-Phenylacetylbenz*iso*thiazolone, 325.
$C_{15}H_{12}ONBr$ 2-Bromo-7-aminofluorene, 450.
$C_{15}H_{12}O_4N_4S_2$ Thiophthienyl ethyl ketone 2:4-dinitrophenylhydrazone, 306.
$C_{15}H_{15}O_3NS$ ω-*p*-Toluenesulphonamidoacetophenone, 711.
$C_{15}H_{16}O_3N_3As$ 4-*n*-Propylaminoazobenzene-4′-arsonic acid, 577.
$C_{15}H_{21}O_4N_3S$ Ethyl 4-(*p*-acetamidobenzenesulphonyl)piperazine-1-carboxylate, 204.

15 V

$C_{15}H_{13}O_3N_2ClS$ 5-Chloro-2-nitro-3-(*p*-tolylthio)acetanilide, 1528.

C_{16} Group.

$C_{16}H_{14}$ 1:2-Dimethylanthracene, 18.
$C_{16}H_{16}$ 1:3-Diphenyl-2-methylpropylene, 821.

16 II

$C_{16}H_{11}N_3$ 1-Imino-3-cyanobenzylidenephthalimidine, 1078.
$C_{16}H_{11}Cl$ 1-Chloro-2-phenylnaphthalene, 379.
$C_{16}H_{11}Br$ Bromo-2-phenylnaphthalenes, 382.
$C_{16}H_{12}O$ Hydroxy-2-phenylnaphthalenes, 383.
$C_{16}H_{12}O_2$ 2′-Hydroxy-6-methylflavone, 1106.
$C_{16}H_{12}O_4$ 6-Acetoxy-5′-methyl-3:4-benzocoumarin, 1120.
$C_{16}H_{13}N$ Amino-2-phenylnaphthalenes, 380.
2-Phenyl-1-naphthylamine, 379.
Phenylnaphthylamines, 381.
$C_{16}H_{14}O$ 1-Keto-7-phenyl-1:2:3:4-tetrahydronaphthalene, 1030.
$C_{16}H_{14}O_3$ 2-(2′:3′-Dimethylbenzoyl)benzoic acid, 18.
β-*p*-Phenylbenzoylpropionic acid, 1030.
$C_{16}H_{14}O_4$ ω-2′-Methoxybenzoyl-2-hydroxyacetophenone, 1106.
2-(2′-Methoxybenzoyloxy)acetophenone, 1106.
$C_{16}H_{14}O_5$ 2-Anisoylanisic acid, 1097.
$C_{16}H_{16}O_2$ γ-4-Diphenylylbutyric acid, 1030.
5″-Hydroxy-2:2:5′-trimethyldibenzopyran, 1120.
6″-Hydroxy-2:2:4″-trimethyldibenzopyran, 1395.
$C_{16}H_{16}O_3$ 6-Benzyloxy-2-methoxyacetophenone, 1373.
β-2-Naphthoyl-αβ-dimethylpropionic acid, 301.
$C_{16}H_{16}O_4$ Acetoxymethyl-3:4-*cyclo*hexenocoumarins, 1124.
Ethyl 4-(4′-methoxyphenoxy)benzoate, 1101.
$C_{16}H_{18}O$ Dibenzylmethylcarbinol, 821.
$C_{16}H_{20}O_3$ 5″-Hydroxy-2:2:5′-trimethyl-3′:4′:5″:6′-tetrahydrodibenzopyran, 1396.
Hydroxy-2:2:5′-trimethyl-3′:4′:5′:6′-tetrahydrodibenzopyrans, 1124.
$C_{16}H_{22}O_2$ 6-Methoxy-1-Δ^3-pentenyl-1-tetralol, 732.
$C_{16}H_{22}O_3$ 2-Keto-5-acetoxy-αβ-di*cyclo*hexylidene-ethane, 14.
$C_{16}H_{22}N_2$ 1-γ-Diethylaminopropyltetrahydroquinoline, 1319.

16 III

$C_{16}H_9O_4N$ Nitro-2-phenyl-1:4-naphthaquinones, 380.
$C_{16}H_{10}ON_2$ 3-Cyanobenzylidenephthalimidine, 1078.
$C_{16}H_{10}O_4N_2$ 1:2′-Dinitro-2-phenylnaphthalene, 380.
1:5-Dinitro-2-phenylnaphthalene, 378.
$C_{16}H_{11}O_2N$ Nitro-2-phenylnaphthalenes, 378.
$C_{16}H_{11}O_3N$ 3-Phenyl-5-(3′:4′-methylenedioxyphenyl)*iso*oxazole, 251.
$C_{16}H_{11}N_2Cl$ 3-Chloro-1-methyl-5:6-benz-4-carboline, 317.
$C_{16}H_{12}O_2N_2$ 1:4-Diacetamido-2-phenylnaphthalene, 379.
$C_{16}H_{12}O_2Cl_2$ 4:4′-Di-ω-chloroacetyldiphenyl, 1317.

$C_{16}H_{12}O_5N_2$ 3-Nitroanisic acid, 1097.
$C_{16}H_{11}NCl$ 4-Chloro-2-phenyl-1-naphthylamine, 378.
$C_{16}H_{12}N_2S_2$ Methin[2-benzthiazole][2-(3-methyldihydrobenzthiazole)], 804.
$C_{16}H_{13}ON_3$ 2′-Hydroxybenzeneazo-β-naphthylamine, copper salts, 612.
$C_{16}H_{14}O_4N_4$ *NN′*-Bisnitrosoacetylbenzidine, 1383.
$C_{16}H_{14}O_7N_4$ 2:4-Dihydroxy-3-formylpropiophenone 2:4-dinitrophenylhydrazone, 246.
$C_{16}H_{14}O_8N_4$ 2-Aldehydo-5-methoxyphenoxyacetic acid 2:4-dinitrophenylhydrazone, 794.
$C_{16}H_{15}O_2N$ 2′-Cyano-2:5-dimethoxy-5′-methyldiphenyl, 1120.
$C_{16}H_{15}O_4N_3$ 2:4-Dihydroxy-3-formylphenyl benzyl ketone semicarbazone, 247.
2:4-Dinitro-3′-dimethylaminostilbene, 57.
$C_{16}H_{16}O_2N_2$ 4-Nitro-3′-dimethylaminostilbene, 58.
$C_{16}H_{17}O_2N_3$ *iso*Dunnione semicarbazones, 1496.
$C_{16}H_{17}O_4N$ Thyronine methyl ester, and its hydrochloride, 1102.
$C_{16}H_{19}ON_3$ Aceto-αβ-ditolylhydrazides, 335.
$C_{16}H_{18}O_4N_4$ Eucarvone 2:4-dinitrophenylhydrazone, 1163.
$C_{16}H_{18}O_6N_2$ 1-Allyl*cyclo*hexanyl 3:5-dinitrobenzoate, 14.
$C_{16}H_{19}N_2I$ 2-*m*-Dimethylaminostyrylpyridine methiodide, 59.
$C_{16}H_{20}O_7N_2$ Ethyl α-*p*-acetamidoanilinofumarate, 1167.
$C_{16}H_{21}ON$ Diethylaminomethyl-1-naphthylcarbinol, and its picrate, 1310.
$C_{16}H_{21}O_2N$ Diethanolaminomethyl-1-naphthylcarbinol, and its picrate, 1310.
$C_{16}H_{22}O_2N_2$ Diethylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dihydrochloride, 1313.
$C_{16}H_{23}O_3N_4$ 6-Nitro-2-β-diethylaminoethylamino-4-methylquinoline, and its salts, 1167.
$C_{16}H_{23}O_6N$ *N*-Benzoyl 3:4:6-trimethyl glucosamine, 31.
$C_{16}H_{24}O_3S$ Phenyl menthyl sulphite, 225.
$C_{16}H_{26}N_4S_2$ 1:10-Bis-2′-amino-4′-thiazolyl-*n*-decane, and its dihydrochloride, 1306.
$C_{16}H_{27}O_4N_3$ Ethyl 2-keto-1-methyl*cyclo*hexylacetate semicarbazone, 417.
$C_{16}H_{33}O_2N$ β-Dimethylaminoethyl laurate, and its hydrochloride, 422.

16 IV

$C_{16}H_{10}O_3NBr$ Phenyl-(6′-bromo-3′:4′-methylenedioxyphenyl)*iso*oxazoles, 251.
$C_{16}H_{10}O_3N_2V$ *o*-Hydroxybenzeneazo-β-naphthol, vanadyl complex, 1068.
$C_{16}H_{11}O_3N_2V$ *o*-Hydroxybenzeneazo-β-naphthylamine, vanadyl complex, 1068.
$C_{16}H_{11}O_3NS$ 2′-Nitrophenyl-2-hydroxy-1-naphthylsulphone, 445.
$C_{16}H_{12}O_4N_2S$ Benzeneazo-α-naphthol-4-sulphonic acid, copper salt, 611.
3′-Sulphobenzeneazo-β-naphthol, copper salts, 611.
$C_{16}H_{12}O_5N_2S$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol, copper salts, 611.
$C_{16}H_{12}O_8N_2S_2$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol-6-sulphonic acid, copper salt, 611.
$C_{16}H_{13}ONS$ 3-Phenylacetamido-1-thionaphthen, 326.
$C_{16}H_{14}ON_2S_2$ Bis(tolylthiocarbimide) oxides, 193.
$C_{16}H_{14}O_3NBr$ 2-Hydroxy-1-*p*-bromophenyl-2-phenyl-5-pyrrolidone, 441.
$C_{16}H_{14}O_2N_2Cl_2$ 3:3′-Dichlorosuccindianilide, 366.
$C_{16}H_{14}O_4N_2Br_2$ Glyoxime *NN′*-bis-3-bromo-4-methoxyphenyl ether, 812.
$C_{16}H_{14}O_4N_2I_2$ Glyoxime *NN′*-bis-3-iodo-4-methoxyphenyl ether, 812.
$C_{16}H_{14}O_4N_2F_2$ Glyoxime *NN′*-bis-3-fluoro-4-methoxyphenyl ether, 812.
$C_{16}H_{20}O_3N_3As$ 4-Butylaminoazobenzene-4′-arsonic acids, 577.
$C_{16}H_{20}O_4N_4S_2$ 1:4-Di-(*p*-aminobenzenesulphonyl)piperazine, 204.
$C_{16}H_{27}O_3N_3S$ N^4-β-Diethylaminoethyl-N^4-acetyl-N^1-dimethylsulphanilamide, 688.
$C_{16}H_{29}O_2N_3S$ N^4-β-Diethylaminoethyl-N^1-diethylsulphanilamide, and its hydrochloride, 689.

16 V

$C_{16}H_{10}O_6N_2SV$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol, vanadyl complex, salts of, 1069.
$C_{16}H_{11}O_6N_2SV$ 2′-Hydroxybenzeneazo-β-naphthol-6-sulphonic acid, vanadyl complex, 1069.
$C_{16}H_{12}O_9N_2S_2V$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol-6-sulphonic acid, vanadyl complex, salts of, 1069.
$C_{16}H_{20}O_7N_2ClAl$ *o*-Hydroxybenzeneazo-β-naphthol aluminichloride pentahydrate, 606.
$C_{16}H_{25}O_{13}N_2SAl$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol aluminisulphonate, 606.
$C_{16}H_{26}O_{12}N_2SAl$ 2′-Hydroxy-5′-sulphobenzeneazo-β-naphthol ammonium hexahydrate, 607.

C_{17} Group.

$C_{17}H_{20}$ 2-Methyl-2-ethyl-1:2:3:4-tetrahydrophenanthrene, 1279.

17 II

$C_{17}H_{11}N$ 4-Pyridyldiphenyls, and their picrates, 1282.
$C_{17}H_{10}O_6$ 5-Hydroxy-6-benzoylcoumarin-3-carboxylic acid, 247.
$C_{17}H_{13}N$ 3-Pyridyldiphenyls, and their picrates, 1281.
$C_{17}H_{14}O$ 3:4-Benzo-1:2:10:11-tetrahydrofluorenones, 1327.
2-Benzylidene-α-tetralone, 638.
Methoxy-2-phenylnaphthalenes, 383.
$C_{17}H_{14}O_3$ 2′-Methoxy-6-methylflavone, 1106.
$C_{17}H_{14}O_5$ Hydroxydimethoxyflavones, 1373.
Pterocarpin, 792.
1:3:8-Trimethoxyanthraquinone, 428.

$C_{17}H_{14}N_2$ Amino-4-pyridyldiphenyls, 1283.
$C_{17}H_{16}O_2$ *p*-Anisyl *p*-methylstyryl ketone, 250.
$C_{17}H_{16}O_3$ *p*-Anisoyl-*p*-toluoylmethane, 250.
$C_{17}H_{16}O_4$ Homopterocarpin, 791.
ω-2′-Methoxybenzoyl-2-hydroxy-5-methylacetophenone, 1106.
2-(2′-Methoxybenzoyloxy)-5-methylacetophenone, 1105.
$C_{17}H_{18}O$ 1-Keto-2-methyl-3-ethyl-1:2:3:4-tetrahydrophenanthrene, 1278.
4-Keto-1:2:3-trimethyl-1:2:3:4-tetrahydrophenanthrene, 302.
$C_{17}H_{18}O_2$ *γ*-2-Naphthyl-*αβγ*-trimethylbutyrolactone, 301.
$C_{17}H_{18}O_3$ *β*-1-Naphthoyl-*α*-methyl-*α*-ethylpropionic acid, 1278.
$C_{17}H_{18}N_4$ 2-Piperazino-4-methyl-5:6:3′:2′-pyridoquinoline, 1166.
$C_{17}H_{20}O_2$ *γ*-1-Naphthyl-*α*-methyl-*α*-ethylbutyric acid, 1278.
γ-2-Naphthyl-*αβγ*-trimethylbutyric acid, 301.
Tetramethyl*iso*propylnaphthaquinone, 1176.
$C_{17}H_{20}O_3$ 4″-Acetoxy-2:2-dimethyl-3′:4′:5′:6′-tetrahydrodibenzopyran, 1124.
Methyl *β*-2-naphthoyl-*αβ*-dimethylpropionate, 301.
$C_{17}H_{21}N_3$ Auramine, and its salts, 461.
$C_{17}H_{22}O_2$ 6″-Hydroxy-2:2:5′:4″-tetramethyl-3′:4′:5′:6′-tetrahydrodibenzopyran, 1124.
$C_{17}H_{22}O_4$ Ethyl 2′:4′-dimethoxyphenyl-Δ^1-*cyclo*hexene-2-carboxylate, 1395.
$C_{17}H_{22}O_5$ Ethyl *α*-carbethoxy-*γ*-acetyl-*α*-phenylbutyrate, 849.

17 III

$C_{17}H_9OCl_2$ 6:13-Dichlorobenzanthrone, 1475.
$C_{17}H_{13}O_2N_3$ Nitro-4-phenyldipyridyls, 1283.
$C_{17}H_{13}O_2N_3$ 2′-Carboxybenzeneazo-*β*-naphthylamine, copper salts, 612.
$C_{17}H_{13}O_3N$ 5-Nitro-6-methoxy-2-phenylnaphthalene, 387.
8-Nitro-7-methoxy-2-phenylnaphthalene, 386.
$C_{17}H_{14}N_2S_2$ Methin[2-benzthiazole][2-(3-ethyldihydrobenzthiazole)], 803.
$C_{17}H_{15}O_2N$ *p*-Anisyl-*p*-tolyl*iso*oxazoles, 251.
$C_{17}H_{15}O_2N_3$ 3-Dimethylamino-*α*-4′-nitrophenylcinnamonitrile, 58.
$C_{17}H_{15}O_2Br$ *p*-Anisyl *α*-bromo-*p*-methylstyryl ketone, 250.
$C_{17}H_{16}O_2Br_2$ *p*-Anisyl *αβ*-dibromo-*β*-*p*-tolylethyl ketone, 250.
$C_{17}H_{16}O_4N_2$ 3-Dimethylamino-*α*-4′-nitrophenylcinnamic acid, 58.
$C_{17}H_{16}O_8N_4$ 5-Methoxy-2-formyl-*β*-phenoxypropionic acid 2:4-dinitrophenylhydrazone, 794.
$C_{17}H_{17}O_2N_3$ 2-Cyano-2′:6′-dimethoxy-4′:5-dimethylazobenzene, 1121.
$C_{17}H_{17}O_2N$ *d-iso*Coclaurine, and its hydrochloride, 744.
$C_{17}H_{17}O_4Br$ Ethyl 1-bromo-2-naphthylmalonate, 298.
$C_{17}H_{18}O_2N_2$ *αβ*-Diacetylphenyl-*o*-tolylhydrazine, 335.
$C_{17}H_{19}ON$ Piperidinomethyl-1-naphthylcarbinol, and its hydrochloride, 1310.
$C_{17}H_{21}O_4N$ *p*-Nitrobenzyl phellandrate, 809.
$C_{17}H_{21}O_{10}N$ 2:3-Dimethyl methylglycuronoside *p*-nitrobenzoate, 1044.
$C_{17}H_{22}O_2N_2$ Piperidinomethyl-6-methoxy-4-quinolylcarbinol, and its hydrochloride, 1313.
$C_{17}H_{23}O_9N$ 5-*p*-Nitrobenzoyl 2:4-dimethyl 3:6-anhydrogalactose dimethylacetal, 627.
$C_{17}H_{24}ON_2$ Dipropylaminomethyl-4-quinolylcarbinol, dipicrate of, 1312.
$C_{17}H_{24}O_4N_2$ 5-Methoxy-1-methylindole-2-carboxydiethylacetalylamide, 318.

17 IV

$C_{17}H_{10}O_4N_2V$ *o*-Carboxybenzeneazo-*β*-naphthol, vanadyl complex, 1068.
$C_{17}H_{12}O_6N_2S$ 2′-Carboxybenzeneazo-*α*-naphthol-4-sulphonic acid, cupric salt, 611.
$C_{17}H_{14}N_2SSe$ Methin[2-benzthiazole][2-(3-ethyldihydrobenzselenazole)], and its hydriodide, 804.
$C_{17}H_{19}O_6N_2S$ *N*-*γ*-(*o*-Carboxybenzamido)propylanilinesulphonic acid, 691.
$C_{17}H_{22}O_3N_3As$ 4-Amylaminoazobenzene-4′-arsonic acids, 577.
4-*sec.*-Butylcarbinylaminoazobenzene-4′-arsonic acid, 577.
$C_{17}H_{23}O_2N_3S$ N^4-*β*-Diethylaminoethyl-N^1-pentamethylenesulphanilamide, and its hydrochloride, 689.
$C_{17}H_{31}O_2N_3S$ N^4-*γ*-Diethylaminopropyl-N^1-diethylsulphanilamide, 690.
$C_{17}H_{36}O_2NCl$ Lauryl choline chloride, 422.
$C_{17}H_{36}O_2NI$ Lauryl choline iodide, 422.

C_{18} Group.

$C_{18}H_{14}$ 8-Methyl-3:4-benzfluorene, 638.
$C_{18}H_{18}$ 1:2:3:4-Tetramethylanthracene, 303.
1:2:3:4-Tetramethylphenanthrene, 1398.
$C_{18}H_{22}$ 1:2:3:4-Tetramethyl-5:6:7:8-tetrahydroanthracene, 302.
$C_{18}H_{30}$ *βγ*-Dimethylbutadiene trimeride, 1169.

18 II

$C_{18}H_{11}Br$ 10-Bromo-1:2-benzanthracene, 410.
$C_{18}H_{12}O$ 8-Methyl-3:4-benzfluorenone, 638.
$C_{18}H_{12}O_4$ 5-Hydroxy-6-phenylacetylcoumarin-3-carboxylic acid, 247.
$C_{18}H_{14}O_3$ 3:4-Benzo-1:2:10:11-tetrahydrofluorenone-1-carboxylic acid, 1326.
1-Phenyl-1:2:3:4-tetrahydronaphthalene-2:3-dicarboxylic anhydrides, 1325.
$C_{18}H_{14}O_4$ 2′-Acetoxy-6-methylflavone, 1106.
$C_{18}H_{13}Br$ *α*-Phenyl-*β*-2-(1-bromonaphthyl)ethane, 298.

$C_{18}H_{16}O$ 2-*o*-Tolylidene-α-tetralone, 638.
$C_{18}H_{16}O_2$ 1:2:3:4-Tetramethylanthraquinone, 303.
$C_{18}H_{16}O_4$ 2-Cinnamoyloxy-4-methoxyacetophenone, 1500.
2-Hydroxy-4-methoxybenzoylcinnamoylmethane, 1500.
$C_{18}H_{16}O_5$ Trimethoxyflavones, 1373.
$C_{18}H_{18}O_3$ 5″-Acetoxy-2:2:5′-trimethyldibenzopyran, 1120.
$C_{18}H_{18}O_5$ α-Phenyl-β-(3:4:5-trimethoxyphenyl)acrylic acid, 199.
$C_{18}H_{18}O_6$ Anisoyloxydimethoxyacetophenones, 1372.
Hydroxytrimethoxydibenzoylmethanes, 1373.
$C_{18}H_{19}N_3$ Piperidinomethyl-5:6:3′:2′-pyridoquinolines, and their salts, 1166.
$C_{18}H_{20}O$ 5-Keto-1:2:3:4-tetramethyl-5:6:7:8-tetrahydroanthracene, 302.
$C_{18}H_{20}O_2$ 9:10-Dihydroxy-1:2:9:10-tetramethyl-9:10-dihydroanthracene, 18.
Metanethole, 1097.
$C_{18}H_{20}O_2$ β-6-(1:2:3:4-Tetramethylnaphthoyl)propionic acid, 302.
$C_{18}H_{20}O_4$ 3:4:5:4′-Tetramethoxystilbene, 200.
$C_{18}H_{22}O_3$ Acetoxy-2:2:5′-trimethyl-3′:4′:5′:6′-tetrahydrodibenzpyrans, 1124.
β-6-(1:2:3:4-Tetramethylnaphthyl)butyric acid, 302.
$C_{18}H_{22}N_4$ 4-β-Diethylaminoethylamino-5:6:3′:2′-pyridoquinoline, 1168.
$C_{18}H_{26}O_{12}$ Ethyl tetra-acetoxyadipate, 865.
Ethyl tetra-acetyl-*dl*-talomucate, 865.
$C_{18}H_{28}O_2$ Hydroxyphenyl undecyl ketone, 836.
$C_{18}H_{31}N$ Dodecylaniline, 576.
$C_{18}H_{34}O_2$ Oleic acid, magnesium salt, relative phase volumes and type of emulsions stabilised by, 211.

18 III

$C_{18}H_{14}ON_2$ *p*-Benzamidophenylpyridines, 373.
$C_{18}H_{14}O_3N_2$ 4-Nitro-2-phenylaceto-1-naphthalide, 379.
$C_{18}H_{14}N_2S$ Methin[2-(1-methyldihydroquinoline)][2-benzthiazole], and its hydriodide, 805.
Methin[2-quinoline][2-(3-methyldihydrobenzthiazole)], and its hydrochloride, 805.
$C_{18}H_{15}ON$ Acetamido-2-phenylnaphthalenes, 380.
Phenylacetonaphthalides, 379, 381.
$C_{18}H_{16}O_2N_2$ *N*-γ-Phthalimidopropylformanilide, 691.
$C_{18}H_{17}O_3N$ α-Cyano-α-phenyl-β-(3:4:5-trimethoxyphenyl)ethylene, 199.
$C_{18}H_{18}O_4N_4$ 1:6-Dimethyltetralone 2:4-dinitrophenylhydrazone, 1242.
$C_{18}H_{18}O_6N_4$ 6-Methoxycoumarone-2-carboxylic acid 2:4-dinitrophenylhydrazone, 794.
$C_{18}H_{19}O_3N$ 2′-Cyano-2:5-diethoxy-5′-methyldiphenyl, 1120.
$C_{18}H_{19}O_4N_3$ 2:4-Dinitro-3′-diethylaminostilbene, 58.
$C_{18}H_{20}O_2N_2$ 4-Nitro-3′-diethylaminostilbene, 58.
$C_{18}H_{21}O_2Cl$ *p*-Chlorophenacyl phellandrates, 809.
$C_{18}H_{21}O_2Br$ *p*-Bromophenacyl phellandrates, 809.
$C_{18}H_{23}O_2N$ Piperidinomethyl-7-methoxy-1-naphthylcarbinol, and its hydrochloride, 1311.
$C_{18}H_{23}N_2I$ 2-*m*-Diethylaminostyrylpyridine methiodide, 59.
$C_{18}H_{25}ON$ Dipropylaminomethyl-1-naphthylcarbinol, picrate of, 1310.
$C_{18}H_{37}O_2N$ β-Diethylaminoethyl laurate, and its hydrochloride, 422.

18 IV

$C_{18}H_{12}ON_2F_2$ Difluorohydroxy-*o*-benzoquinonebisphenylimines, 207.
$C_{18}H_{14}ONCl$ 4-Chloro-2-phenylaceto-1-naphthalide, 379.
$C_{18}H_{15}O_2NF_2$ *N*-Acetyl-4:2′-difluoro-2:4′-diacetoxydiphenylamine, 206.
$C_{18}H_{19}N_2IS$ 2-*m*-Dimethylaminostyrylbenzthiazole methiodide, 59.
$C_{18}H_{21}O_4N_2As$ 4-*cyclo*Hexylaminoazobenzene-4′-arsonic acid, 577.
$C_{18}H_{24}O_3N_2As$ 4-*n*-Hexylaminoazobenzene-4′-arsonic acid, 577.
4-(2-Methyl-*N*-pentyl)aminoazobenzene-4′-arsonic acid, 577.
$C_{18}H_{42}Cl_6As_2Hg_3$ Bistripropylarsinetrismercuric chloride, 1221.
$C_{18}H_{42}Br_2P_2Cd$ Dibromobistripropylphosphinecadmium, 1217.
$C_{18}H_{42}Br_4P_2Cd_2$ Dibromobistripropylphosphine-μ-dibromodicadmium, 1218.
$C_{18}H_{42}Br_4P_2Hg_2$ Dibromobistripropylphosphine-μ-dibromomercury, 1219.
$C_{18}H_{42}Br_4As_2Hg_2$ Dibromobistripropylarsine-μ-dibromodimercury, 1220.
$C_{18}H_{42}I_2P_2Cd$ Di-iodobistripropylphosphinecadmium, 1217.
$C_{18}H_{42}I_2P_2Hg$ Di-iodobis(tripropylphosphine)mercury, 1234.
$C_{18}H_{42}I_2As_2Cd$ Di-iodobistripropylarsinecadmium, 1217.
$C_{18}H_{42}I_4P_2Cd_2$ Di-iodobistripropylphosphine-μ-di-iododicadmium, 1218.
$C_{18}H_{42}I_4P_2Hg_2$ Di-iodobistripropylphosphine-μ-di-iodomercury, 1219.
$C_{18}H_{42}I_4As_2Cd_2$ Di-iodobistripropylarsine-μ-di-iododicadmium, 1218.
$C_{18}H_{42}I_4As_2Hg_2$ Di-iodobistripropylarsine-μ-di-iododimercury, 1220.
$C_{18}H_{42}I_4As_2Hg_3$ Tetra-iodotristriethylarsinedimercury, 1222.

18 V

$C_{18}H_{42}Br_2P_2CdHg$ Dibromobis(tripropylphosphine)-μ-dibromocadmium-mercury, 1234.
$C_{18}H_{42}Br_4As_2HgPd$ Dibromobis(tri-*n*-propylarsine)-μ-dibromopalladium-mercury, 1234.
$C_{18}H_{42}I_4P_2CdHg$ Di-iodobis(tri-*n*-propylphosphine)-μ-di-iodocadmium-mercury, 1233.

18 VI

$C_{18}H_{42}Br_2I_2P_2CdHg$ Dibromodi-iodobis(propylphosphine)cadmium-mercury, 1234.
$C_{18}H_{42}I_4AsPCdHg$ Di-iodotripropylphosphinetripropylarsine-μ-di-iodocadmium-mercury, 1234.

C_{19} Group.

$C_{19}H_{14}$ 1-Methyl-3:4-benzphenanthrene, 297.
$C_{19}H_{20}$ 2-Methyl-1-Δ^{γ}-butenyl-3:4-dihydrophenanthrene, 733.
2-Methyl-1-*n*-butylphenanthrene, 734.

19 II

$C_{19}H_{11}N$ 3:4-Benz-2-phenanthronitrile, 1161.
$C_{19}H_{12}O$ 3:4-Benz-1-phenanthraldehyde, 297.
$C_{19}H_{12}O_2$ 3:4-Benz-2-phenanthroic acid, 297.
$C_{19}H_{13}Br$ 10-Bromo-6-methyl-1:2-benzanthracene, 412.
10-Bromo-9-methyl-1:2-benzanthracene, 412.
$C_{19}H_{14}O$ β-Naphthyl styryl ketone, 250.
$C_{19}H_{14}O_2$ Benzoyl-β-naphthoylmethane, 250.
1:2-Dihydro-3:4-benz-1-phenanthroic acid, 298.
Methyl-1:2-benzanthracene photo-oxides, 1126.
$C_{19}H_{14}O_3$ Benzoyl-2-hydroxy-1-naphthoylmethane, 1500.
o-Hydroxyphenyl 6-hydroxy-2:3-benzostyryl ketone, 818.
$C_{19}H_{14}O_5$ 5-Hydroxy-3-acetyl-6-phenylacetylcoumarin, 247.
$C_{19}H_{16}O_2$ *l*-β-Naphthylmethylcarbinyl benzoate, 678.
$C_{19}H_{16}O_3$ β-Phenyl-α-2-(1-hydroxynaphthyl)propionic acid, 298.
$C_{19}H_{16}O_6$ Acetoxydimethoxyflavones, 1373.
$C_{19}H_{18}O$ 3:4-Benz-2-phenanthraldehyde, 1162.
2-(2′:4′:6′-Trimethylbenzylidene)-α-hydrindone, 639.
$C_{19}H_{18}O_2$ 1:2:3:4-Tetramethyl-10-phenanthroic acid, 1398.
$C_{19}H_{20}O_2$ αγ-Di-*p*-toluoylpropane, 452.
$C_{19}H_{20}O_3$ 5-Hydroxy-5′-methyl-7-*n*-amyl-3:4-benzocoumarin, 1395.
6-Hydroxy-5′-methyl-7-*n*-amyl-3:4-benzocoumarin, 1121.
$C_{19}H_{20}O_5$ Diacetyldihydro-α-dunnione, 1496.
Diacetyldihydro*iso*dunniones, 1496.
Diacetyldihydro*allo*dunnione, 1498.
$C_{19}H_{20}O_6$ α-*p*-Anisyl-β-(3:4:5-trimethoxyphenyl)acrylic acid, 199.
$C_{19}H_{22}O_5$ Colchinol methyl ether, carbinol from, 197.
$C_{19}H_{22}O_6$ α-*p*-Anisyl-*p*-(3:4:5-trimethoxyphenyl)propionic acid, 200.
$C_{19}H_{24}O_3$ 6″-Acetoxy-2:2:5′:4″-tetramethyl-3′:4′:5′:6′-tetrahydrodibenzopyran, 1124.
5-Hydroxy-5′-methyl-7-*n*-amyl-3:4-*cyclo*hexenocoumarin, 1123.
$C_{19}H_{24}N_4$ β-Diethylaminoethylaminomethyl-5:6:3′:2′-pyridoquinolines, and their salts, 1166
4-γ-Diethylaminopropylamino-5:6:3′:2′-pyridoquinoline, 1168.
$C_{19}H_{26}O$ δ-2:6:6-Trimethyl-Δ^1-*cyclo*hexenyl-β-phenyl-Δ^{γ}-buten-β-ol, 1241.
$C_{19}H_{26}O_6$ 2:3:5-Trimethyl methylgalactofuranoside, 1116.
$C_{19}H_{33}N$ Di-*n*-hexylbenzylamine, 1314.

19 III

$C_{19}H_{11}OCl$ 3:4-Benz-2-phenanthroyl chloride, 1161.
$C_{19}H_{13}ON$ 1:2-Benz-10-anthramide, 410.
3:4-Benz-1-phenanthramide, 1160.
3:4-Benzphenanthramides, 1161.
Phenyl-β-naphthyl*iso*oxazoles, 251.
$C_{19}H_{13}OBr$ β-Naphthyl α-bromostyryl ketone, 250.
$C_{19}H_{13}O_2Cl$ 2′-Hydroxy-5:6-benzoflavylium chloride, 818.
$C_{19}H_{13}O_2Br$ α-Phenyl-β-2-(1-bromonaphthyl)acrylic acid, 297.
$C_{19}H_{14}OBr_2$ β-Naphthyl αβ-dibromo-β-phenylethyl ketone, 250.
$C_{19}H_{11}OF$ *p*-Fluorotriphenylcarbinol, 1254.
$C_{19}H_{15}O_2Br$ α-2-(1-Bromonaphthyl)-β-phenylpropionic acid, 298.
$C_{19}H_{16}ON_2$ Acetamido-4-pyridyldiphenyls, 1283.
$C_{19}H_{16}O_4N_4$ α-Naphthylacetone 2:4-dinitrophenylhydrazone, 821.
$C_{19}H_{16}N_2S$ Methin[2-(1-ethyldihydroquinoline)][2-benzthiazole], and its hydriodide, 806.
Methin[2-quinoline][2-(3-ethyldihydrobenzthiazole)], and its hydriodide, 805.
Methin[4-quinoline][2-(3-ethyldihydrobenzthiazole)], and its hydriodide, 807.
$C_{19}H_{16}N_2S_2$ Trimethin[2-benzthiazole][2-(3-ethyldihydrobenzthiazole)], 804.
$C_{19}H_{19}ON_3$ 1-Phenyl-4-3′-dimethylaminobenzylidene-5-pyrazolone, 59.
$C_{19}H_{19}O_3N_3$ 3-Diethylamino-α-4′-nitrophenylcinnamonitrile, 58.
$C_{19}H_{19}O_4N$ α-Cyano-α-*p*-anisyl-β-(3:4:5-trimethoxyphenyl)ethylene, 200.
o-Nitro-α-2′:3′:4′:5′-tetramethylphenylcinnamic acid, 1397.
$C_{19}H_{20}O_4N_2$ 3-Diethylamino-α-4′-nitrophenylcinnamic acid, 58.
$C_{19}H_{20}O_6N_2$ δ-*p*-Tolyl-*n*-amyl 3:5-dinitrobenzoate, 452.
$C_{19}H_{21}ON$ 4-Diphenylylpiperidinomethylcarbinol and its salts, 1317.
$C_{19}H_{21}O_3N$ *o*-Amino-α-2′:3′:4′:5′-tetramethylphenylcinnamic acid, 1398.
αγγ-Trimethylallyl *p*-xenylurethane, 1549.
$C_{19}H_{21}O_4N$ α-Cyano-α-*p*-anisyl-β-(3:4:5-trimethoxyphenyl)ethane, 200.
$C_{19}H_{23}ON_3$ 5-Keto-1:2:3:4-tetramethyl-5:6:7:8-tetrahydroanthracene semicarbazone, 302.
$C_{19}H_{23}O_2N$ Methyl*iso*butylcarbinyl *p*-xenylurethane, 1549.
$C_{19}H_{23}O_4N$ Ethyl α-cyano-ε-phenyl-β-methyl-Δ^{α}-pentene-αε-dicarboxylate, 850.
$C_{19}H_{17}ON_3$ Camphor δ-(α-phenylethyl)semicarbazones, 338.
$C_{19}H_{31}O_2N_3$ *p*-Hydroxyphenyl undecyl ketone semicarbazone, 836.
$C_{19}H_{35}O_{11}N$ Hexamethyl 6-β-glycuronosido-β-methylgalactopyranoside amide, 78.

19 IV

$C_{19}H_{15}O_2N_3As$ 4-Benzylaminoazobenzene-4′-arsonic acid, 577.
$C_{19}H_{20}O_2N_2S$ *p*-Toluenesulphonylpiperidinobenzonitriles, 1515.
$C_{19}H_{22}O_2N_3As$ 4-*n*-Heptylaminoazobenzene-4′-arsonic acid, 577.
$C_{19}H_{36}S_3P_2Au_2$ Toluene-3:4-bis(thiotriethylphosphinegold), 1238.
$C_{19}H_{40}O_2NI$ Methyl-β-lauryloxyethyldiethylammonium iodide, 422.

C_{20} Group.

$C_{20}H_{16}$ 5:7-Dimethyl-1:2-benzanthracene, 639.
1:2-Dimethylchrysene, 300.
$C_{20}H_{18}$ 1:2-Dihydro-1:2-dimethylchrysene, 301.
5:7-Dimethyl-*x*:*x*′-dihydro-1:2-benzanthracene, 638.
$C_{20}H_{38}$ *l*-Menthyl, 347.

20 II

$C_{20}H_{12}O_3$ 1:2-Benzanthranyl-10-glyoxylic acid, 411.
$C_{20}H_{13}N$ 10-Cyano-6-methyl-1:2-benzanthracene, 412.
10-Cyano-9-methyl-1:2-benzanthracene, 412.
$C_{20}H_{12}Br_2$ *aa*-Di-*p*-bromophenyl-β-phenylbromoethylene, 1328.
$C_{20}H_{14}O$ Acetyl-3:4-benzphenanthrenes, 1160.
1:2-Benzanthranyl-10-acetaldehyde, 412.
9-Methyl-1:2-benz-10-anthraldehyde, 412.
$C_{20}H_{14}O_2$ Methyl 3:4-benz-2-phenanthroate, 298.
$C_{20}H_{14}O_3$ α-Hydroxy-1:2-benzanthranyl-10-acetic acid, 411.
1-(2′-Methoxy-1′-naphthylidene)coumaran-2-one, 819.
2-(2′-Methoxy-1′-naphthyl)chromone, 819.
$C_{20}H_{14}O_4$ 2-(2′-Methoxy-1′-naphthyl)-3-chromonol, 818.
$C_{20}H_{14}O_7$ Dehydromalaccol, 313.
$C_{20}H_{14}O_8$ 1:3:8-Triacetoxyanthraquinone, 428.
$C_{20}H_{14}Br_2$ *aa*-Di-*p*-bromophenyl-β-phenylethylene, 1328.
$C_{20}H_{14}I_2$ *aa*-Di-*p*-iodophenyl-β-phenylethylene, 1328.
$C_{20}H_{16}O$ 1:2-Dimethylchrysene-1:2-oxide, 300.
10-β-Hydroxyethyl-1:2-benzanthracene, 411.
10-Hydroxymethyl-6-methyl-1:2-benzanthracene, 412.
$C_{20}H_{16}O_2$ 9-10-Dimethyl-1:2-benzanthracene photo-oxide, 1126.
$C_{20}H_{16}O_3$ *o*-Anisyl 6-hydroxy-2:3-benzostyryl ketone, 818.
2-(2′:3′-Dimethylbenzoyl)-1-naphthoic acid, 17.
o-Hydroxyphenyl 6-methoxy-2:3-benzostyryl ketone, 818.
$C_{20}H_{16}O_4$ *p*-Anisoyl-2-hydroxy-1-naphthoylmethane, 1500.
2-*p*-Anisoyloxy-1-acetonaphthone, 1499.
Naphthylmethylcarbinyl hydrogen phthalate, 678.
$C_{20}H_{16}O_6$ Ethyl 5-hydroxy-6-phenylacetylcoumarin-3-carboxylate, 247.
$C_{20}H_{16}O_7$ Malaccol, 309.
$C_{20}H_{16}N_2$ Methin[2-quinoline][2-(1-methyldihydroquinoline)], 808.
$C_{20}H_{17}Cl$ Diphenyl-*m*-tolylmethyl chloride, 1246.
$C_{20}H_{18}O_2$ 1:2-Dihydroxy-1:2-dimethyl-1:2-dihydrochrysene, 300.
$C_{20}H_{20}O$ 2-(2′:4′:6′-Trimethylbenzylidene)-α-tetralone, 638.
$C_{20}H_{20}O_2$ Ketomethoxymethylhexahydrochrysene, 732.
$C_{20}H_{20}O_4$ Methyl 1-phenyl-1:2:3:4-tetrahydronaphthalene-2:3-dicarboxylates, 1326.
$C_{20}H_{22}O_6$ 4:4′-Dimethoxystilbenediol diacetate, 1328.
$C_{20}H_{26}O_7$ Tetrahydromalaccol, 313.
$C_{20}H_{22}O_2$ Ketomethoxymethyloctahydrochrysene, 733.
$C_{20}H_{22}O_3$ Methyl *o*-hydroxy-α-2′:3′:4′:5′-tetramethylphenylcinnamate, 1398.
$C_{20}H_{22}O_6$ Matairesinols, 1100.
$C_{20}H_{22}O_6$ *meso*-αβ-Di-(4-hydroxy-3-methoxybenzyl)succinic acid, 1100.
$C_{20}H_{24}O_2$ 9:10-Dimethoxy-1:2:9:10-tetramethyl-9:10-dihydroanthracene, 18.
Metanethole, structure of, 1094.
4-*iso*Propenyl-*m*-cresol, 1105.
$C_{20}H_{24}N_2$ *ar*-Octahydrodinaphthyline, 201.
ar-Octahydronaphthidine, 202.
$C_{20}H_{24}N_4$ 2-γ-Diethylaminopropylamino-4-methyl-5:6:3′:2′-pyridoquinoline, 1166.
$C_{20}H_{30}O_2$ Miropinic acids, 683.
$C_{20}H_{32}O_2$ Dihydromiropinic acids, 685.
$C_{20}H_{34}O_2$ Tetrahydromiropinic acids, 685.
$C_{20}H_{33}N$ Tetradecylaniline, 576.
$C_{20}H_{32}O_{12}$ Methyl heptamethyl aldobionate, 74.
$C_{20}H_{32}O_{11}$ Octamethyl 3-galactosidogalactose, 81.
$C_{20}H_{40}O_2$ 2-Methylnonadecoic acid, 71.
$C_{20}H_{41}Br$ 1-Bromo-2-methylnonadecane, 71.
2-Bromo-2-methylnonadecane, 70.
$C_{20}H_{42}O$ 2-Methylnonadecan-1-ol, 71.
$C_{20}H_{44}N_2$ 1:10-Bis*iso*amylaminodecane, and its hydrochloride, 1320.
$C_{20}H_{46}N_4$ 1:6-Bis-(γ-diethylaminopropylamino)hexane, and its hydrobromide, 1320.

20 III

$C_{20}H_{13}Cl_2Br$ *aa*-Di-*p*-chlorophenyl-*β*-phenylbromoethylene, 1328.
$C_{20}H_{13}BrI_2$ *aa*-Di-*p*-iodophenyl-*β*-phenylbromoethylene, 1328.
$C_{20}H_{14}O_2Br_2$ 1-(2′-Methoxy-1′-naphthylidene)coumaran-2-one dibromide, 819.
$C_{20}H_{14}O_7N_4$ 2:4-Dihydroxy-3-formylbenzophenone 2:4-dinitrophenylhydrazone, 247.
$C_{20}H_{15}ON_3$ 3:4-Benz-1-phenanthraldehyde semicarbazone, 297.
3:4-Benz-2-phenanthraldehyde semicarbazone, 1162.
$C_{20}H_{16}OBr_2$ Di-*p*-bromophenylbenzylcarbinol, 1328.
$C_{20}H_{16}OI_2$ Di-*p*-iodophenylbenzylcarbinol, 1328.
$C_{20}H_{16}O_2Br_2$ *o*-Hydroxyphenyl *αβ*-dibromo-*β*-2-methoxy-1-naphthylethyl ketone, 818.
$C_{20}H_{17}O_2N_3$ *m*-Nitroacetophenone diphenylhydrazone, 170.
$C_{20}H_{18}O_2N_4$ Phenylazo-bis-benzaldoxime, metallic salts, 655.
$C_{20}H_{21}N_2I$ 2-*m*-Dimethylaminostyrylquinoline methiodide, 59.
$C_{20}H_{22}O_2Br_2$ Dibromometanethole, 1097.
$C_{20}H_{22}O_4N_2$ Dinitrometanethole, 1097.
$C_{20}H_{23}O_4N_3$ 2:4-Dinitro-3′-dipropylaminostilbene, 58.
$C_{20}H_{24}O_3N_2$ 4-Nitro-3′-dipropylaminostilbene, 59.
$C_{20}H_{27}N_2I$ 2-*m*-Dipropylaminostyrylpyridine methiodide, 59.
$C_{20}H_{29}ON_3$ Camphor δ-(*α*-phenylpropyl)semicarbazones, 338.
$C_{20}H_{30}O_2N_2$ Dibutylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dipicrate, 1313.
$C_{20}H_{44}O_2N_2$ 1:12-Diethylamino-2:11-dihydroxydodecane, 1318.

20 IV

$C_{20}H_{13}O_3NCl_2$ 4:6-Dichloro-*N*-benzoyldiphenylamine-2-carboxylic acid, 273.
$C_{20}H_{17}O_2NS$ 2-*p*-Toluenesulphonamidofluorene, 450.
$C_{20}H_{17}O_2NS_2$ 2:6-Di-*p*-tolylthionitrobenzene, 1527.
$C_{20}H_{17}O_4NS_2$ 2:6-Di-*p*-toluenesulphonylnitrobenzene, 1527.
$C_{20}H_{18}O_2N_2S_2$ Nitro-3:5-di-(*p*-tolylthio)anilines, 1528.
$C_{20}H_{23}N_2IS$ 2-*m*-Diethylaminostyrylbenzthiazole methiodide, 59.
$C_{20}H_{24}O_4N_4S_2$ 1:4-Di-(*p*-acetamidobenzenesulphonyl)piperazine, 204.
$C_{20}H_{28}O_4N_2S_2$ 1:6-Bis-*p*-toluenesulphonylaminohexane, 1319.

20 V

$C_{20}H_{15}O_2NBr_2S$ 3:7-Dibromo-2-*p*-toluenesulphonamidofluorene, 450.
$C_{20}H_{16}O_2NClS_2$ 4-Chloro-2:6-di-*p*-tolylthionitrobenzene, 1527.
2-Chloro-4:6-di-(*p*-tolylthio)nitrobenzene, 1528.
$C_{20}H_{16}O_2NBrS$ 2-Bromo-7-*p*-toluenesulphonamidofluorene, 449.
$C_{20}H_{16}O_2NBrS_2$ 4-Bromo-2:6-di-*p*-tolylthionitrobenzene, 1527.
$C_{20}H_{16}O_6NClS_2$ 4-Chloro-2:6-di-*p*-toluenesulphonylnitrobenzene, 1527.
$C_{20}H_{21}O_{11}N_4SAl$ 2′-Hydroxy-4′-sulphonaphthalene-1′:4-azo-1-phenyl-3-methylpyrazol-5-one aluminisulphonate hexahydrate, 607.

C_{21} Group.

$C_{21}H_{16}$ 2-*iso*Propenyl-3:4-benzphenanthrene, 298.
$C_{21}H_{18}$ Propyl-3:4-benzphenanthrenes, 1161.
2-*iso*Propyl-3:4-benzphenanthrene, 298.
6:9:10-Trimethyl-1:2-benzanthracene, 17.
$C_{21}H_{20}$ 2:5-Dimethyltriphenylmethane, 1246.
$C_{21}H_{28}$ Octamethyldiphenylmethane, 1397.

21 II

$C_{21}H_{16}O$ Propionyl-3:4-benzphenanthrenes, 1161.
$C_{21}H_{16}O_2$ 1:2-Dimethylchrysene-7-carboxylic acid, 300.
Ethyl 3:4-benz-1-phenanthroate, 1161.
$C_{21}H_{16}O_4$ Toluquinol dibenzoate, 329.
$C_{21}H_{16}O_6$ 5:6:4′-Trihydroxyflavone, 1374.
$C_{21}H_{18}O$ 3:4-Benz-2-phenanthryldimethylcarbinol, 298.
$C_{21}H_{18}O_2$ Diphenyl-*o*-tolylacetic acid, 885.
10-*iso*Propyl-1:2-benzanthracene photo-oxides, 1126.
Trimethyl-1:2-benzanthracene photo-oxides, 1126.
$C_{21}H_{18}O_3$ *o*-Anisyl 6-methoxy-2:3-benzostyryl ketone, 818.
$C_{21}H_{19}N_3$ Methin[2-quinoline][2-(1-ethyldihydroquinoline)], 808.
$C_{21}H_{21}As_3$ Tri-*p*-tolyldiarsine, 1190.
$C_{21}H_{19}Cl$ 2:5-Dimethyltriphenylmethyl chloride, 1246.
$C_{21}H_{20}O$ 2:5-Dimethyltriphenylcarbinol, 1245.
$C_{21}H_{20}O_3$ 9:10-Dihydroxy-6:9:10-trimethyl-9:10-dihydro-1:2-benzanthracene, 17.
2-Methoxy-4′-methyltriphenylcarbinol, 877.
$C_{21}H_{20}O_5$ Methyl *p*-phenylphenacyl dimethylmaleic anhydride, 414.
$C_{21}H_{22}O_4$ 5-Acetoxy-5′-methyl-7-*n*-amyl-3:4-benzocoumarin, 1395.
6-Acetoxy-5′-methyl-7-*n*-amyl-3:4-benzocoumarin, 1121.
$C_{21}H_{24}O_6$ Ethyl *α*-*p*-anisyl-*β*-(3:4:5-trimethoxyphenyl)acrylate, 199.
$C_{21}H_{24}N_4$ 3-*β*-Diethylaminoethylamino-5:6-benz-4-carboline, and its dihydrobromide, 316.

$C_{21}H_{26}O_2$ Cannabinol, structure of, 649.
5″-Hydroxy-2:2:5′-trimethyl-4″-*n*-amyldibenzopyran, 1121.
$C_{21}H_{26}O_6$ 2:3-Dibenzyl β-methylgalactoside, 1148.
2:3-Dibenzyl α-methylglucoside, 454.
$C_{21}H_{28}O_5$ Ethyl 5-carbethoxy-2-phenyl-5-methyl*cyclo*hexanone-6-β-propionate, 850.
$C_{21}H_{30}O_2$ Cannabidiol from hashish, 649.
6″-Hydroxy-2:2:5′-trimethyl-4″-*n*-amyl-3′:4′:5′:6′-tetrahydrodibenzopyran, 1124.
$C_{21}H_{30}O_6$ Ethyl α-phenyl-δ-methylpentane-αδε-tricarboxylate, 850.
$C_{21}H_{32}O_2$ Methyl micropinate, 685.
$C_{21}H_{32}O_5$ Erythrophleic acid, 289.
$C_{21}H_{32}O_{10}$ Tetra-acetyl 1-3-methyl*cyclo*hexylglucosides, 244.
$C_{21}H_{34}O_6$ Sarcostin, 1443.
$C_{21}H_{36}O_6$ Dihydrosarcostin, 1445.
$C_{21}H_{37}N$ Di-*n*-heptylbenzylamine, 1314.
$C_{21}H_{40}O_4$ Methylheptadecylmalonic acid, 71.

21 III

$C_{21}H_{16}O_7N_4$ 2:4-Dihydroxy-3-formylphenyl benzyl ketone 2:4-dinitrophenylhydrazone, 247.
$C_{21}H_{17}ON_3$ Acetyl-3:4-benzphenanthrene semicarbazones, 1160.
$C_{21}H_{17}O_3N$ *N*-Benzoyl-6-methyldiphenylamine-2-carboxylic acid, 272.
$C_{21}H_{17}O_4N$ α-1-(3:4-Dimethylnaphthyl)-*o*-nitrocinnamic acid, 300.
$C_{21}H_{19}ON_3$ β-*iso*Dunnione phenyleneazine, 1496.
$C_{21}H_{19}O_4N$ α-1-(3:4-Dimethylnaphthyl)-*o*-aminocinnamic acid, 300.
p-Methoxyphenyl α-anilinobenzyl ketone, 349.
Phenyl α-anilino-*p*-methoxybenzyl ketone, 348.
$C_{21}H_{19}O_2N_3$ 3-Diallylamino-α-4′-nitrophenylcinnamonitrile, 58.
$C_{21}H_{20}ON_2$ 4-*p*-Toluidino-2:5-toluquinonebis-*p*-tolylimine, 772.
$C_{21}H_{23}O_2N_3$ 3-Dipropylamino-α-4′-nitrophenylcinnamonitrile, 58.
$C_{21}H_{24}O_4N_2$ 3-Dipropylamino-α-4′-nitrophenylcinnamic acid, 59.
$C_{21}H_{25}O_2N$ 2′-Cyano-2:5-dimethoxy-5′-methyl-4-*n*-amyldiphenyl, 1121.
$C_{21}H_{26}O_{10}S_2$ Ditosyl α-methylgalactopyranoside, 624.
2:3-Ditosyl β-methylgalactoside, 1149.
$C_{21}H_{27}O_5N$ *N*-Acetyl-β-*p*-anisyl-γ-(3:4:5-trimethoxyphenyl)propylamine, 200.
$C_{21}H_{29}ON_3$ 4′:4″-Piperidylpiperidinomethyl-4-quinolylcarbinol, and its salts, 1312.
$C_{21}H_{33}ON_3$ Diamylaminomethyl-4-quinolylcarbinol, dipicrate of, 1312.

21 IV

$C_{21}H_{14}ONBr$ Diphenyl-*o*-bromophenyl*iso*oxazole, 449.
$C_{21}H_{15}O_3NCl_2$ Methyl 4:6-dichloro-*N*-benzoyldiphenylamine-2-carboxylate, 273.
N-Phenylbenzimino-4:6-dichloro-2-carbomethoxyphenyl ether, 273.
$C_{21}H_{16}O_3NCl$ 2-Chloro-*N*-benzoyl-6′-methyldiphenylamine-2′-carboxylic acid, and its brucine salt, 274.
$C_{21}H_{17}O_2NS_2$ *p*-Toluenesulphonyl-*p*-tolylthiobenzonitriles, 1524.
$C_{21}H_{19}O_3N_7Fe$ α-Carbethoxybenzylpyridinium ferrocyanide, 228.
$C_{21}H_{20}O_5N_2S$ *p*-Toluenesulphonyl-4-(4′-methoxyphenoxy)benzhydrazide, 1102.
$C_{21}H_{23}O_5NCl$ Benzyl ε-chloro-α-carbobenzyloxyamido-δ-ketohexoate, 709.
$C_{21}H_{26}O_2NI$ *O*-Methyl*iso*coclaurine methiodide, 745.
$C_{21}H_{24}O_7N_4S_2$ Ethyl 4-(*p*-acetamidobenzenesulphonamidobenzenesulphonyl)piperazine-1-carboxylate, 204.

C_{22} Group.

$C_{22}H_{16}$ 2:7-Diphenylnaphthalene, 382.
$C_{22}H_{20}$ 5:6:9:10-Tetramethyl-1:2-benzanthracene, 18.

22 II

$C_{22}H_{16}O_5$ Acetyl-2-(2′-methoxy-1′-naphthyl)-3-chromonol, 818.
$C_{22}H_{18}O_2$ 10-Acetoxymethyl-6-methyl-1:2-benzanthracene, 412.
$C_{22}H_{18}O_4$ *o*-Acetoxyphenyl 6-methoxy-2:3-benzostyryl ketone, 818.
$C_{22}H_{20}O_3$ 5:6:9:10-Tetramethyl-1:2-benzanthracene photo-oxide, 1126.
$C_{22}H_{20}O_3$ 4-Acetoxy-2:6-dibenzylidene*cyclo*hexanone, 14.
$C_{22}H_{22}O$ 2:6-Di-*o*-tolylidene*cyclo*hexanone, 638.
$C_{22}H_{22}O_2$ 9:10-Dihydroxy-5:6:9:10-tetramethyl-9:10-dihydro-1:2-benzanthracene, 18.
$C_{22}H_{26}O_3$ 2′-Acetoxy-2:4:4:7:4′-pentamethylflavan, 1105.
$C_{22}H_{26}O_6$ Methyl *meso*-αβ-di-(4-hydroxy-3-methoxybenzyl)succinate, 1100.
$C_{22}H_{26}N_4$ 3-β-Diethylaminoethylamino-1-methyl-5:6-benz-4-carboline, and its dihydrochloride, 317.
$C_{22}H_{33}N$ *N*-Dodecyl-β-naphthylamine, 389.
$C_{22}H_{34}O_5$ Methyl erythrophleate, 289.
$C_{22}H_{34}O_{10}$ Tetra-acetyl 4-methyl*cyclo*hexylcarbinylglucosides, 244.
$C_{22}H_{34}N_4$ *NN′*-Bis-(5″-aminoamyl)benzidine, and its tetrahydrochloride, 1319.
$C_{22}H_{42}N_2$ 1:1′-Bis-(β-diethylaminoethyl)dipiperidyls, 1319.

22 III

$C_{22}H_{16}N_2S$ Methin[2-(1-methyldihydroquinoline)][2-(4:5-benzbenzthiazole)], 806.
$C_{22}H_{17}ON_3$ Propionyl-3:4-benzphenanthrene semicarbazones, 1161.
$C_{22}H_{19}O_2N$ *N*-Benzoyl-2:6′-dimethyldiphenylamine-2′-carboxylic acid, 273.

$C_{22}H_{19}O_2N$ Methyl *N*-benzoyl-6-methyldiphenylamine-2-carboxylate, 272.
Phenylbenzimino-2-carbomethoxy-6-methylphenyl ether, 272.
$C_{22}H_{19}O_4Br$ 1-Bromo-1-(ethoxy-2′-methoxy-1′-naphthyl methyl)coumaran-2-one, 819.
$C_{22}H_{21}O_2N$ *p*-Methoxyphenyl α-methylanilinobenzyl ketone, 349.
p-Methoxyphenyl α-*p*-toluidinobenzyl ketone, 349.
Phenyl α-methylanilino-*p*-methoxybenzyl ketone, 349.
Phenyl α-*p*-toluidino-*p*-methoxybenzyl ketone, 349.
$C_{22}H_{21}O_3Br$ *o*-Hydroxyphenyl α-bromo-β-ethoxy-β-2-methoxy-1-naphthylethyl ketone, 819.
$C_{22}H_{26}O_6N_4$ 2-Keto-5-acetoxy-αβ-di*cyclo*hexylidene-ethane 2:4-dinitrophenylhydrazone, 14.
$C_{22}H_{23}N_2Fe$ *iso*Propylpyridinium ferrocyanide, 229.
$C_{22}H_{30}O_2N_2$ Aspidospermine, 1051.
$C_{22}H_{26}O_4N_4$ Trimethyl galactose methylphenylphenylosazone, 1481.
$C_{22}H_{31}O_2N_3$ 4′:4″-Piperidylpiperidinomethyl-6-methoxy-4-quinolylcarbinol, and its trihydrochloride, 1315.
$C_{22}H_{34}O_2N_2$ Diamylaminomethyl-6-methoxy-4-quinolylcarbinols, and their dipicrates, 1313.
$C_{22}H_{44}O_2N_2$ 1:12-Dipiperidino-2:11-dihydroxydodecane, 1318.

22 IV

$C_{22}H_{18}O_2NCl$ *o*-Chlorophenylbenzimino-2′-carbomethoxy-6′-tolyl ether, 273.
Methyl 2-chloro-*N*-benzoyl-6′-methyldiphenylamine-2′-carboxylate, 274.
$C_{22}H_{20}O_2N_2S_2$ Nitro-3:5-di-(*p*-tolylthio)acetanilides, 1528.
$C_{22}H_{21}O_3NS$ *N*-*p*-Toluenesulphonylthyronine, 1102.
$C_{22}H_{29}O_4N_2I$ Carbobenzyloxyphenylalanyl choline iodide, 425.

C_{23} Group.

$C_{23}H_{14}O_2$ Naphthyl-5:6-benzochromones, 1500.
$C_{23}H_{14}O_3$ Hydroxy-2′-naphthyl-5:6-benzochromones, 1500.
$C_{23}H_{16}O_3$ Hydroxydinaphthoylmethanes, 1500.
Naphthoyloxy-1-acetonaphthones, 1500.
$C_{23}H_{24}O_3$ 9:10-Dimethoxy-6:9:10-trimethyl-9:10-dihydro-1:2-benzanthracene, 17.
$C_{23}H_{28}O_6$ Tetra-acetyldihydrohydroxyhydroi*so*dunniol, 1497.
$C_{23}H_{30}O_6$ 2:3-Dibenzyl 4:6-dimethyl β-methylgalactoside, 1168.
2:3-Dibenzyl 4:6-dimethyl α-methylglucoside, 455.
$C_{23}H_{32}O_3$ 6″-Acetoxy-2:2:5′-trimethyl-4″-*n*-amyldibenzpyran, 1395.
$C_{23}H_{34}O_{10}$ Tetra-acetyl 1-cryptylglucosides, 244.
$C_{23}H_{36}O_{10}$ Tetra-acetyl dihydrocryptylglucosides, 244.

23 III

$C_{23}H_{18}N_2S$ Methin[2-(1-ethyldihydroquinoline)][2-(4:5-benzbenzthiazole)], 806.
Methin[2-(1-ethyldihydroquinoline)][2-(6:7-benzbenzthiazole)], 807.
Methin[2-quinoline][2-(3-ethyldihydro-6:7-benzbenzthiazole)], 807.
$C_{23}H_{21}O_2N$ Methyl *N*-benzoyl 2:6′-dimethyldiphenylamine-2′-carboxylate, 273.
N-*o*-Tolylbenzimino-2′-carbomethoxy-6-methylphenyl ether, 272.
$C_{23}H_{11}O_6N$ *N*-Carbobenzyloxythyronine, 1103.
$C_{23}H_{30}O_{10}N_2$ Fructose methylphenylhydrazone acetate, 1511.
$C_{23}H_{30}O_{10}S_2$ 2:3-Di-*p*-toluenesulphonyl 4:6-dimethyl α-methylglucoside, 455.
2:3-Ditosyl 4:6-dimethyl β-methylgalactoside, 1149.

C_{24} Group.

$C_{24}H_{20}$ 1:3-Dinaphthyl-2-methylpropylenes, 821.
Quaterphenyl, 1379.
$C_{24}H_{22}$ *as*-1:1′-(2:2′-Dimethyldinaphthyl)ethane, 298.

24 II

$C_{24}H_{16}O_2$ Methoxy-2′-naphthyl-5:6-benzochromones, 1500.
$C_{24}H_{17}N_3$ 3′-Amino-2:3-diphenyl-5:6-benzquinoxaline, 386.
$C_{24}H_{18}O_2$ 9:10-Dimethyl-1:2:5:6-dibenzanthracene, 1126.
$C_{24}H_{18}O_3$ Dihydroxyquaterphenyls, 1382.
$C_{24}H_{18}O_4$ Hydroxymethoxydinaphthoylmethanes, 1500.
Methoxynaphthoyloxy-1-acetonaphthones, 1500.
$C_{24}H_{20}N_2$ 4:4‴-Diaminoquaterphenyl, 1383.
$C_{24}H_{24}N_2$ Tetramethyldinaphthyline, 202.
$C_{24}H_{28}O_2$ 9-10-Dimethoxy-5:6:9:10-tetramethyl-9:10-dihydro-1:2-benzanthracene, 18.
$C_{24}H_{28}O_{10}$ *dl*-αβ-Di-(4-acetoxy-3-methoxybenzyl)succinic acid, 1100.
$C_{24}H_{28}O_3$ *p*-Phenylphenacyl *dl*-1:2-dimethyl*cyclo*hexylacetate, 418.
$C_{24}H_{32}N_2$ Tetramethyl-*ar*-octahydrodinaphthyline, 202.
$C_{24}H_{38}O_{10}$ Tetra-acetyl menthylglucosides, 243.
Tetra-acetyl 4-*iso*propyl*cyclo*hexylcarbinylglucosides, 244.
$C_{24}H_{40}O_2$ Hydroxyphenyl heptadecyl ketones, 837.
$C_{24}H_{43}N$ Octadecylaniline, 576.
$C_{24}H_{54}N_4$ 1:10-Bis-(γ-diethylaminopropylamino)decane, 1320.

24 III

$C_{24}H_{16}O_4N_2$ 4:4‴-Dinitroquaterphenyl, 1382.
$C_{24}H_{20}BrSb$ Tetraphenylstilbonium bromide, 1195.
$C_{24}H_{20}IP$ Tetraphenylphosphonium iodide, 1195.
$C_{24}H_{20}IAs$ Tetraphenylarsonium iodide, 1194.
$C_{24}H_{20}ISb$ Tetraphenylstibonium iodide, 1195.
$C_{24}H_{21}O_3N_3$ Benzoin δ-(α-phenylpropyl)semicarbazones, 337.
$C_{24}H_{28}O_2N_2$ Diacetyl-*ar*-octahydronaphthidine, 202.
Dibenzoyl-4:4′-dipiperidyl, 1312.
$C_{24}H_{30}N_6Fe$ *sec.*-Butylpyridinium ferrocyanide, 229.
$C_{24}H_{32}O_5N_4$ Hydroxyphenyl undecyl ketone 2:4-dinitrophenylhydrazones, 836.
$C_{24}H_{28}O_2N_2$ Di-*n*-hexylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dipicrate, 1314.
$C_{24}H_{23}O_6N$ Erythrophleine, and its sulphate, 286.

24 IV

$C_{24}H_{39}O_3N_2As$ 4-*n*-Dodecylaminoazobenzene-4′-arsonic acid, 577.
$C_{24}H_{36}O_4N_2S_2$ 1:10-Bis-*p*-toluenesulphonylaminodecane, 1320.
$C_{24}H_{54}Cl_2P_2Hg_2$ Bistributylphosphinetrismercuric chloride, 1221.
$C_{24}H_{54}Br_4P_2Hg_2$ Dibromobistributylphosphine-μ-dibromomercury, 1219.
$C_{24}H_{54}Br_4As_2Hg_2$ Dibromobistributylarsine-μ-dibromodimercury, 1220.
$C_{24}H_{54}Br_6As_2Hg_3$ Bistributylarsinetrimercuric bromide, 1221.
$C_{24}H_{54}I_4P_2Hg_2$ Di-iodobistributylphosphine-μ-di-iodomercury, 1219.
$C_{24}H_{54}I_4As_2Hg_2$ Di-iodobistributylarsine-μ-di-iododimercury, 1220.
$C_{24}H_{54}I_6As_2Hg_3$ Bistributylarsinetrimercuric iodide, 1221.

24 V

$C_{24}H_{54}I_4P_2CdHg$ Di-iodobis(tri-*n*-butylphosphine)-μ-di-iodocadmium-mercury, 1233.
Di-iodotri-*n*-propylphosphinetri-*n*-amylphosphine-μ-di-iodocadmium-mercury, 1233.

C_{25} Group.

$C_{25}H_{24}$ 3:3′:4:4′-Tetramethyl-1:1′-dinaphthylmethane, 299.

25 II

$C_{25}H_{16}O_4$ Acetoxy-2′-naphthyl-5:6-benzochromones, 1500.
$C_{25}H_{20}O$ *p*-Phenoxytriphenylmethane, 1334.
$C_{25}H_{32}O_3$ *p*-Hydroxyphenyl undecyl ketone benzoate, 836.
$C_{25}H_{48}O_4$ Ethyl methylheptadecylmalonate, 71.

25 III

$C_{25}H_{17}ON$ 3:4-Benz-1-phenanthranilide, 297.
$C_{25}H_{43}O_2N_3$ *p*-Hydroxyphenyl heptadecyl ketone semicarbazone, 837.

25 IV

$C_{25}H_{28}O_2N_2S_2$ 2-Piperidino-4:6-di(*p*-tolylthio)nitrobenzene, 1528.
4-Piperidino-2:6-di-*p*-tolylthionitrobenzene, 1527.

C_{26} Group.

$C_{26}H_{22}O_2$ Dimethoxyquaterphenyls, 1381.
$C_{26}H_{22}O_5$ Ethyl 2-(2′-methoxy-1′-naphthyl)-3:4-1″:2″-coumarano-Δ^4-*cyclo*hexen-6-one-1-carboxylate, 819.
$C_{26}H_{22}As_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthrens, 1189.
$C_{26}H_{24}O_4$ 1-(2′-Keto-1′-*cyclo*hexyl-2″-methoxy-1″-naphthylmethyl)coumaran-2-one, 819.
$C_{26}H_{24}O_5$ Ethyl 4-*o*-hydroxyphenyl-6-(2′-methoxy-1′-naphthyl)-Δ^3-*cyclo*hexen-2-one-1-carboxylate, 818.
$C_{26}H_{26}O_4$ 2-β-*o*-Hydroxybenzoyl-α-2′-methoxy-1′-naphthylethyl*cyclo*hexanone, 818.
$C_{26}H_{26}O_{10}$ Triacetyltetrahydromalaccol, 313.
$C_{26}H_{28}O_6$ 6-Trityl methylgalactofuranoside, 1116.
$C_{26}H_{40}N_4$ *NN′*-Bis-(γ-diethylaminopropyl)benzidine, and its tetrahydrobromide, 1319.
$C_{26}H_{44}O_2$ 6-Hydroxy-2-methyl-2-(4′:8′:12′-trimethyltridecyl)chroman, 330.

26 III

$C_{26}H_{18}O_6N_4$ 1-(2′-Methoxy-1′-naphthylidene)coumaran-2-one 2:4-dinitrophenylhydrazone, 819.
$C_{26}H_{22}O_2As_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthren dioxide, 1190.
$C_{26}H_{22}Br_2As_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthren dibromide, 1191.
$C_{26}H_{22}SAs_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthren sulphide, 1191.
$C_{26}H_{23}O_5N$ Ethyl 2-(2′-methoxy-1′-naphthyl)-3:4-1″:2″-coumarano-Δ^4-*cyclo*hexen-6-one-1-carboxylate oxime, 819.
$C_{26}H_{21}O_5N$ Ethyl 4-*o*-hydroxyphenyl-6-(2′-methoxy-1′-naphthyl)-Δ^3-*cyclo*hexen-2-one-1-carboxylate oxime, 818.
$C_{26}H_{24}O_4As_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthren tetrahydroxide, 1190.
$C_{26}H_{30}N_2I_2$ Hexamethylnaphthidineammonium di-iodide, 202.
$C_{26}H_{32}O_2N_2$ 4:4′-Bis-(β-piperidino-α-hydroxyethyl)diphenyl, 1317.
$C_{26}H_{32}O_9N_4$ Anhydrocellobiosazone, 1480.
$C_{26}H_{43}O_2N_3$ Di-*n*-heptylaminomethyl-6-methoxy-4-quinolylcarbinol, and its dipicrate, 1314.

26 IV

$C_{26}H_{31}O_6NS$ *p*-Toluenesulphonyl-β-*p*-anisyl-γ-(3:4:5-trimethoxyphenyl)propylamine, 200.
$C_{26}H_{32}N_2Cl_6Pt$ *n*-Butylquinolinium chloroplatinate, 225.
$C_{26}H_{40}O_3N_2As$ 4-*n*-Tetradecylaminoazobenzene-4′-arsonic acid, 577.

26 V

$C_{26}H_{30}O_6N_2Br_2S_2$ β-Bromoethyl carbobenzyloxycystine, 424.

C_{27} Group.

$C_{27}H_{48}$ Zymostane, 1488.

27 II

$C_{27}H_{24}O$ *r*-β-Hydroxy-αββ-triphenyl-α-benzylethane, 843.
$C_{27}H_{28}O_3$ *p*-Phenylphenacyl δ-*p*-tolyl-*n*-hexoate, 452.
$C_{27}H_{42}O_2$ Δ^5-Cholestene-3:4-diones, 62.
$C_{27}H_{42}O_6$ Dihydrosarcostin triacetate, 1446.
$C_{27}H_{44}O$ Dehydro-α-zymostenol, 1489.
Zymosterol, constitution of, 1482.
$C_{27}H_{44}O_2$ Cholestane-3:4-dione, 64.
$C_{27}H_{46}O$ Zymostanone, 1488.
Zymostenols, 1486.
$C_{27}H_{46}O_2$ 6-Hydroxy-2:8-dimethyl-2-(4′:8′:12′-trimethyltridecyl)chroman, 330.
$C_{27}H_{46}O_4$ Zymostanedicarboxylic acid, 1488.
$C_{27}H_{48}O$ Zymostanol, 1487.

27 III

$C_{27}H_{22}O_4N_4$ *r*-Benzyldeoxybenzoin 2:4-dinitrophenylhydrazone, 843.
$C_{27}H_{21}IAs_2$ 5:10-Di-*p*-tolyl-5:10-dihydroarsanthren methiodides, 1191.
$C_{27}H_{26}O_6N_2$ *p*-Nitrobenzyl methyl-β-*o*-tolylethylmalonate, 1241.
$C_{27}H_{27}O_5N_3$ Ethyl 4-*o*-hydroxyphenyl-6-(2′-methoxy-1′-naphthyl)-Δ^3-*cyclo*hexen-2-one-1-carboxylate, 818.
$C_{27}H_{28}O_{14}N_4$ Tetra-acetyl *p*-aldehydophenyl-β-glucoside, 1402.
$C_{27}H_{40}OBr_2$ 4:6-Dibromo-7-keto-$\Delta^{3:5}$-cholestadiene, 663.
$C_{27}H_{41}OBr$ 6-Bromo-7-keto-$\Delta^{3:5}$-cholestadiene, 663.
$C_{27}H_{41}OBr_3$ 3:4:6-Tribromo-7-keto-Δ^5-cholestene, 663.
$C_{27}H_{44}OBr_2$ Zymosterol dibromide, 1485.
$C_{27}H_{45}OBr$ Bromozymostanone, 1488.

27 IV

$C_{27}H_{33}O_8NS_3$ 2:4:6-Tri-*p*-tolylthionitrobenzene, 1527.
$C_{27}H_{63}Br_4P_3Cd_2$ Tetrabromotristriethylphosphinedicadmium, 1218.
$C_{27}H_{63}I_2P_3Hg_2$ Tetra-iodotristripropylphosphinedimercury, 1222.
$C_{27}H_{63}I_4As_2Hg_2$ Tetra-iodotristripropylarsinedimercury, 1222.

C_{28} Group.

$C_{28}H_{46}$ Hydrocarbon from quillaic acid, 1335.

28 II

$C_{28}H_{22}O_4$ Diacetoxyquaterphenyls, 1382, 1385.
$C_{28}H_{30}O_6$ 2:3-Dibenzyl 4:6-benzylidene β-methylgalactoside, 1148.
2:3-Dibenzyl 4:6-benzylidene α-methylglucoside, 454.
$C_{28}H_{32}O_2$ 2-Pentadecyl-5:6-benzochromone, 1500.
$C_{28}H_{40}O_2$ 2-Hydroxy-1-naphthoylpalmitylmethane, 1500.
2-Palmityloxy-1-acetonaphthone, 1500.

28 III

$C_{28}H_{20}O_4Cl_2$ Dichloroacetoxyquaterphenyls, 1382, 1385.
$C_{28}H_{23}O_2N$ *dl*-β-Hydroxy-ζ-*p*-tolyl-β-methylheptane xenylmethane, 453.
$C_{28}H_{22}O_4N_2$ 2:4-Dinitro-3′-dibenzylaminostilbene, 58.
$C_{28}H_{29}O_5N$ Cannabinol, 1395.
$C_{28}H_{30}O_{10}S_2$ 2:3-Di-*p*-toluenesulphonyl 4:6-benzylidene α-methylaltroside, 321.
2:3-Ditosyl 4:6-benzylidene β-methylgalactoside, 1149.
$C_{28}H_{32}O_8N_4$ Methyl erythrophleate 2:4-dinitrophenylhydrazone, 289.

28 V

$C_{28}H_{32}O_4N_2Cl_6Pt$ α-Carbethoxyethylquinolinium chloroplatinate, 225.

C_{29} Group.

$C_{29}H_{48}$ Oleanenes, 1473.

29 II

$C_{29}H_{34}O_6$ 6-Trityl 2:3:5-trimethyl methylgalactofuranoside, 1116.
6-Trityl 2:3:4-trimethyl β-methylgalactopyranoside, 1510.
$C_{29}H_{44}O_5$ Gypsogenic acid, 620.
$C_{29}H_{46}O$ 16-Keto-$\Delta^{12:13}$-oleanene, 1472.
$C_{29}H_{44}O_2$ 3(β)-Acetoxy-$\Delta^{4:5}$-cholestadiene, 67.
Zymosteryl acetate, 1486.

$C_{29}H_{48}O_2$ 3-Acetoxy-Δ^5-cholesten-4-one, 64.
Quillaol, 1472.
$C_{29}H_{46}O_4$ 3-Acetoxycholestan-4-one-5:6-oxide, 63.
$C_{29}H_{48}O$ 16-Hydroxyoleanene, 1473.
$C_{29}H_{50}O_2$ Norlupanonol, 457.
β-Zymostenyl acetate, 1487.
$C_{29}H_{48}O_3$ *cis*-3-Acetoxy-Δ^5-cholesten-4-ol, 63.
$C_{29}H_{50}O_2$ Zymostanyl acetate, 1487.
$C_{29}H_{50}O_4$ Methyl zymostanedicarboxylate, 1488.

29 III

$C_{29}H_{22}O_6N_2$ Di-*p*-nitrobenzoyl 2-methyl-4-β-phenylethylresorcinol, 247.
$C_{29}H_{35}O_{15}N$ 2:4:5-Tri-*p*-nitrobenzoyl 3:6-anhydrogalactose dimethylacetal, 631.
$C_{29}H_{30}O_{10}S$ 3-*p*-Toluenesulphonyl 4:6-dibenzoyl 2-methyl α-methylaltroside, 322.
$C_{29}H_{46}O_3Br_2$ 5:6-Dibromo-7-ketocholestanyl acetate, 662.

29 IV

$C_{29}H_{31}O_4NS$ β-Naphthalenesulphonyl-β-*p*-anisyl-γ-(3:4:5-trimethoxyphenyl)propylamine, 200.

C_{30} Group.

$C_{30}H_{42}O_4$ Diketone from methyl bassate, 719.
$C_{30}H_{46}O$ β-Amyradienone, 236, 1202.
$C_{30}H_{46}O_5$ Bassic acid, constitution of, 713.
Methyl gypsogenate, 620.
Quillaic acid, structure of, 1469.
$C_{30}H_{48}O$ β-Amyradienol, 1201.
Dehydro-β-amyrenol, 236.
$C_{30}H_{48}O_2$ Ketolupeol, 1338.
$C_{30}H_{48}O_4$ Deoxyquillaic acid, 617.
$C_{30}H_{50}O_2$ Brein, 798.
Maniladiol, 797.
$C_{30}H_{50}O_4$ Dihydropolyporenic acid A, 1492.
$C_{30}H_{50}O_{12}$ *sec.*-Octyl tetra-acetylmucates, 865.
$C_{30}H_{52}O_2$ Lupanetriol, 456.

30 III

$C_{30}H_{25}O_6N$ *ON*-Dibenzoylthyronine methyl ester, 1102.
$C_{30}H_{44}O_5N_4$ Hydroxyphenyl heptadecyl ketone 2:4-dinitrophenylhydrazones, 837.
$C_{30}H_{47}ON$ β-Amyradienone oxime, 236.
$C_{30}H_{60}O_2N_2$ 1:14-Dipiperidino-2:13-dihydroxy-2:13-dipropyltetradecane, 1318.

30 IV

$C_{30}H_{43}O_3N_2As$ 4-*n*-Octadecylaminoazobenzene-4′-arsonic acid, 577.
$C_{30}H_{66}I_4P_2Hg_2$ Di-iodobistriamylphosphine-μ-di-iodomercury, 1220.

C_{31} Group.

$C_{31}H_{29}N_3$ *N*-2-Anthrylauramine, and its hydrochloride, 463.
$C_{31}H_{44}O_3$ *p*-Hydroxyphenyl heptadecyl ketone benzoate, 837.
$C_{31}H_{46}O_5$ Methyl dehydrobassate, 718.
$C_{31}H_{48}O_3$ Methyl 16-keto-oleanolate, 1472.
$C_{31}H_{48}O_4$ 3:4-Diacetoxy-$\Delta^{3:5}$-cholestadiene, 64.
$C_{31}H_{48}O_5$ Methyl bassate, 717.
$C_{31}H_{50}O_2$ ψ-Taraxasteryl formate, 798.
$C_{31}H_{50}O_4$ Methyl deoxyquillaate, 617.
$C_{31}H_{52}O_4$ Methyl dihydropolyporenate, 1492.

31 III

$C_{31}H_{28}O_8N_8$ $\alpha\gamma$-Di-*p*-toluoylpropane bis-2:4-dinitrophenylhydrazone, 452.

C_{32} Group.

$C_{32}H_{28}O_6$ *p*-Phenylphenacyl α-phenyl-β-(3:4:5-trimethoxyphenyl)acrylate, 199.
$C_{32}H_{30}O_6$ *p*-Phenylphenacyl α-phenyl-β-(3:4:5-trimethoxyphenyl)propionate, 199.
$C_{32}H_{50}O_2$ *epi*(*iso*)-α-Amyrenonyl acetate, 1197.
Ketolupenyl acetate, 1337.
$C_{32}H_{50}O_4$ α-Amyradionyl acetate, 1198.
Brein diformate, 798.
$C_{32}H_{50}O_5$ Methyl polyporenate formate, 1492.
$C_{32}H_{50}O_6$ Methyl polyporenate A keto-acetate, 1492.
$C_{32}H_{52}O_2$ β-Amyrenonyl acetate, 1202.
$C_{32}H_{54}O_2$ β-Amyradienyl acetate, 1200.

32 III

$C_{32}H_{16}N_8Pt$ Platinum phthalocyanine, 36.
$C_{32}H_{40}O_5N_8$ Methyl dehydrobassate semicarbazone, 718.
$C_{32}H_{51}O_8N_3$ Methyl quillaate semicarbazone, 616.

32 IV

$C_{32}H_{20}O_4N_4V$ *o*-Hydroxybenzeneazo-β-naphthol, vanadium complex, 1068.
$C_{32}H_{32}O_2N_6V$ *o*-Hydroxybenzeneazo-β-naphthylamine bisazo-vanadi-complex, 1068.
$C_{32}H_{28}O_9N_4Al_2$ *o*-Hydroxybenzeneazo-β-naphthol alumini-oxide tetrahydrate, 606.
$C_{32}H_{33}O_6NS_3$ 1-Piperidino-2:4:6-tri-*p*-toluenesulphonylbenzene, 1527.

32 V

$C_{32}H_{48}O_8N_4I_2S_2$ Carbobenzyloxycystinyl choline iodide, 424.

C_{33} Group.

$C_{33}H_{30}O_7$ *p*-Phenylphenacyl α-*p*-anisyl-β-(3:4:5-trimethoxyphenyl)acrylate, 200.
$C_{33}H_{32}O_7$ *p*-Phenylphenacyl α-*p*-anisyl-β-(3:4:5-trimethoxyphenyl)propionate, 200.
$C_{33}H_{54}O_5$ Methyl dihydropolyporenate acetate, 1492.

33 III

$C_{33}H_{38}O_6N_4$ 3-β-Diethylaminoethylamino-1:4-dimethylcarbolinium disalicylate, 316.
$C_{33}H_{46}O_4N_4$ $\Delta^{4:8}$-Cholestadien-3-one 2:4-dinitrophenylhydrazone, 67.
$C_{33}H_{46}O_5N_4$ Δ^{5}-Cholestene-3:4-dione 2:4-dinitrophenylhydrazone, 63.
$C_{33}H_{48}O_5N_4$ Cholestane-3:4-dione 2:4-dinitrophenylhydrazone, 65.
$C_{33}H_{53}O_3N_3$ Ketolupenyl acetate semicarbazone, 1338.

C_{34} Group.

$C_{34}H_{34}O_8$ *meso*-αβ-Di-(4-benzyloxy-3-methoxybenzyl)succinic acid, 1099.
$C_{34}H_{48}O_4$ 3-Benzoyloxycholestan-4-one-5:6-oxide, 63.
$C_{34}H_{50}O_2$ *epi*Cholesterol benzoate, 1392.
Zymostenol benzoates, 1486.
$C_{34}H_{52}O_2$ Zymostanyl benzoate, 1487.
$C_{34}H_{54}O_4$ β-Amyranonyl acetate enol-acetate, 1512.
Maniladiol diacetate, 797.
$C_{34}H_{54}O_{13}$ *l*-Menthyl tetra-acetoxyadipate, 865.
$C_{34}H_{56}O_5$ Lupanetriol diacetate, 456.

34 III

$C_{34}H_{38}O_{12}N_2$ *l*-Matairesinol di-*p*-nitrobenzoate, 1101.
$C_{34}H_{34}O_2N_4$ Bis-*NN'*-phenylcarbamyl-*ar*-octahydrodinaphthyline, 202.
$C_{34}H_{36}O_9S$ 3-*p*-Toluenesulphonyl 6-triphenylmethyl α-methylaltroside, 323.
$C_{34}H_{40}O_6N_4$ 3-γ-Diethylaminopropylamino-1:4-dimethylcarbolinium disalicylate, 316.
$C_{34}H_{40}O_{12}N_4$ Penta-acetylanhydrocellobiosazone, 1480.
$C_{34}H_{53}O_2N$ Cholestanyl phenylurethane, 1487.
Zymostanyl phenylurethane, 1487.

C_{35} Group.

$C_{35}H_{21}N_5$ Tetrabenzazaporphin, and its metallic salts, 1081; *X*-ray structure of, 602.

35 III

$C_{35}H_{34}O_{12}N_4$ Cannabidiol bis-3:5-dinitrobenzoate, 652.
$C_{35}H_{36}O_6N_2$ Chondrofoline, and its salts, 742.

C_{36} Group.

$C_{36}H_{22}N_4$ Tetrabenzporphin, and its metallic salts, 1083; *X*-ray structure of, 602.

36 III

$C_{36}H_{38}O_9S$ 3-*p*-Toluenesulphonyl 4-acetyl 6-triphenylmethyl 2-methyl α-methylaltroside, 323.
$C_{36}H_{50}O_6N_4$ Gypsogenic acid 2:4-dinitrophenylhydrazone, 620.

36 IV

$C_{36}H_{30}Cl_2P_2Hg$ Dichlorobistriphenylphosphinemercury, 1218.
$C_{36}H_{30}Cl_4P_2Hg_2$ Dichlorobistriphenylphosphine-ω-dichloromercury, 1220.
$C_{36}H_{30}Br_2P_2Cd$ Dibromobistriphenylphosphinecadmium, 1217.
$C_{36}H_{30}Br_2As_2Hg$ Dibromobistriphenylarsinemercury, 1219.
$C_{36}H_{30}Br_2P_2Hg_2$ Dibromobistriphenylphosphine-μ-dibromomercury, 1220.
$C_{36}H_{30}Br_4As_2Hg_2$ Dibromobistriphenylarsine-μ-dibromodimercury, 1220.
$C_{36}H_{30}I_2P_2Cd$ Di-iodobistriphenylphosphinecadmium, 1217.
$C_{36}H_{30}I_2P_2Hg$ Di-iodobistriphenylphosphinemercury, 1218.
$C_{36}H_{30}I_2As_2Hg$ Di-iodobistriphenylarsinemercury, 1219.

$C_{36}H_{62}Br_4P_2Cd_2$ Tetrabromotristributylphosphinedicadmium, 1218.
$C_{36}H_{62}I_4P_2Cd_2$ Tetraiodotristributylphosphinedicadmium, 1218.
$C_{36}H_{62}I_4P_2Hg_2$ Tetra-iodotristributylphosphinedimercury, 1222.
$C_{36}H_{62}I_4As_2Hg_2$ Tetra-iodotristributylarsinedimercury, 1222.

36 V

$C_{36}H_{56}O_8N_4I_2S_2$ Di-(β-diethylaminoethyl)carbobenzyloxycystine dimethiodide, 423.

C_{37} Group.

$C_{37}H_{52}O_2$ β-Amyradienyl benzoate, 1201.
Dehydro-β-amyrenyl benzoate, 236.
$C_{37}H_{52}O_3$ Ketolupenyl benzoate, 1337.
$C_{37}H_{54}O_2$ β-Amyranonyl benzoate, 235.

37 IV

$C_{37}H_{56}O_{16}N_2S_2$ Methyl-β-glycyloxyethyldiethylammonium dirufianate, 423.

C_{38} Group.

$C_{38}H_{36}O_{11}$ Anisyltrimethoxyphenylacrylic anhydride, 200.

38 III

$C_{38}H_{24}O_6N_2$ Di-*o*-nitrobenzoyloxyquaterphenyls, 1385.
$C_{38}H_{28}O_2F_2$ *p*-Fluorotriphenylmethyl peroxide, 1255.
$C_{38}H_{46}O_{16}N_4$ Cellobiosazone hepta-acetate, 1480.
Gentiobiosazone hepta-acetate, 1481.
Melibiosazone hepta-acetate, 1481.
$C_{38}H_{54}O_6N_4$ Ketolupenyl acetate 2:4-dinitrophenylhydrazone, 1338

C_{38} IV

$C_{38}H_{44}O_4N_2I_2$ *d-iso*Chondrodendrine methiodide, 745.

C_{39} Group.

$C_{39}H_{56}O_3N_2As$ 4-Cholesterylaminoazobenzene-4′-arsonic acid, 577.

C_{40} Group.

$C_{40}H_{34}O_2$ Diphenyl-*o*-tolylmethyl peroxide, 885.
Diphenyl-*m*-tolylmethyl peroxide, 1248.

40 III

$C_{40}H_{46}O_6N_2$ α-*O*-Methyl*iso*chondrodendrinemethine, hydrochloride of, 746.

C_{42} Group.

$C_{42}H_{32}O_2$ 2:5-Dimethyltriphenylmethyl peroxide, 1248.

C_{44} Group.

$C_{44}H_{56}O_4$ Maniladiol dibenzoate, 798.

C_{50} Group.

$C_{50}H_{54}O_6N_4S_2$ *NN′*-Bis-(5″-benzamidoamyl)benzidine di-*p*-toluenesulphonate, 1319.

C_{54} Group.

$C_{54}H_{84}O_4$ $\Delta^{2:5}$-Cholestadien-3-ol-4-onyl-6:6′-(4′:3′-cholestadien-4′-ol-3′-one), 63.

C_{58} Group.

$C_{58}H_{88}O_6$ $\Delta^{2:5}$-Cholestadien-3-ol-4-onyl-6:6′-($\Delta^{4':3'}$-cholestadien-4′:ol-3′-one)diacetate, 65.

C_{60} Group.

$C_{60}H_{88}O_7N_4$ $\Delta^{2:5}$-Cholestadien-3-ol-4-onyl-6:6′-($\Delta^{4':3'}$-cholestadien-4′-ol-3′-one) 2:4-dinitrophenylhydrazone, 65.

ERRATA.

VOL., 1939.

Page.	Line.	
1639	5	*For* "$k \times 10^4$" *read* "$k \times 10^{-4}$."

VOL., 1940.

138	11*	*For* "Todd" *read* "William Maxwell Todd (unpublished observation)."
201	4* and 1*	*For* "amine" *read* "imine."
449	25	For "4 *Nitrodiphenyl*" read "3-*Nitrodiphenyl*."
,,	44	*For* "4-nitrodiphenyl" *read* "3-nitrodiphenyl."
899	11 *	*For* "1938" *read* "1936."
915	20 *	*For* "901" *read* "905."
932	20 *	*For* "case 6" *read* "case 2."
939	8 *	Insert "*t*."
945	20	*For* "Pr^{α}" *read* "Pr^{β}."
960	21	Insert "*t*."
969	25	*For* "225" *read* "255."
986	19 *	*For* "disposal" *read* "disposable."
990	26 *	*For* "S_N'" *read* "S_N^1."
994	eqn. 17	*For* "10_{16}" *read* "10^{16}."
1001	,, 20 (denominator)	For "$DT^{3/2}$" read "$(DT)^{3/2}$."
,,	,, 21 (numerator)	For "$(c + x)^{\frac{1}{2}}(DT)^{3/2}$" read "$(c + x)^{\frac{1}{2}}/(DT)^{3/2}$."
,,	,, 21 (denominator)	For "$(c \times x)^{\frac{1}{2}}$" read "$(c + x)^{\frac{1}{2}}$."
,,	,, 22 (numerator)	For "$(c - x')^{\frac{1}{2}}$" read "$(c + x')^{\frac{1}{2}}$."
1022	5 *	*For* "date" *read* "data."
1023	5	*For* "$c = [NMe_4Cl]_{t=0}$" *read* "$c = [NMe_4F]_{t=0}$."
1024	Fig. 3.	For "$\frac{k_2}{k_2^{(\mu)}/c}$" read "$\frac{k_2}{k_1^{(\mu)}/c}$."
1027	5	*For* "interal" *read* "internal."
1028	1	*For* "by" *read* "of."
,,	Table III	Delete braces from col. 4.

INDEX, 1939.

Page	Col.	Line.	
1967	1	3*	For "*D. A.*" read "*D. H.*."
1993	2	13*	*For* "*m*- and *p*-**Polyphenols**" *read* "*m*- and *p*-**Polyphenyls**."

* From bottom

SYMBOLS FOR THERMODYNAMICAL AND PHYSICO-CHEMICAL QUANTITIES AND CONVENTIONS RELATING TO THEIR USE, ADOPTED AS RECOMMENDED PRACTICE BY THE CHEMICAL SOCIETY.

(Where two or more symbols separated by commas or semicolons are given for a quantity, these symbols are to be regarded as alternatives for which no preference is expressed. On the other hand, where two symbols are separated by a dotted line, the former is the first preference.)

1. To be Printed in Black Italic.

(Certain important physical constants.)

$\mathbf{F}$	Faraday's constant.
$\mathbf{J}$	Mechanical equivalent of heat.
$\mathbf{N}$	Avogadro's number.
$\mathbf{R}$	Gas constant per mol. / Rydberg's constant.
$\mathbf{c}$	Velocity of light in vacuo.
$\mathbf{e}$	Electronic charge (charge equal and opposite in sign to that of an electron).
$\mathbf{g}$	Acceleration due to gravity (standard value, if variation from standard is significant).
$\mathbf{h}$	Planck's constant.
$\mathbf{k}$	Boltzmann's constant.
$\mathbf{m}$	Rest mass of an electron.

2. To be Printed in Ordinary Italic, when not Greek.

General Physics and Chemistry.

Length	l
mean free path of molecules	l
height	h
diameter, distance	d
diameter of molecules	σ
radius	r
Mass	m
molecular weight	M
atomic weight	A
atomic number	Z
gram-equivalent weight	Z, J
Time	t
time interval, especially half- or mean-life	τ
frequency	ν
Velocity	v; c, (u, v, w)
of ions	u (with subscript)
angular	ω
Acceleration	$f \ldots a$
due to gravity (as variable)	g

Force	F, (X, Y, Z)
Moment of inertia	I
Pressure	p, P
especially osmotic	Π
Volume	v, V
Density	$\rho \ldots d$
Compressibility	$\kappa \ldots K$
Viscosity	η
Fluidity	ϕ
Surface area	$A \ldots s$
Angle of contact	θ
Surface tension	$\gamma \ldots \sigma$
Parachor	$[P]$
Surface concentration excess	Γ
Number of mols	n
Concentration, mol fraction	N, x
in other terms	c, C
Solubility	s
Diffusion coefficient	D
Chemical equilibrium constant (products/reactants)	K
solubility product	$K_s \ldots L$
Velocity constant of chemical reaction	k
Number of molecular collisions per second	Z
Partition function	f
Efficiency, of any process	η
Wave function	ψ

Heat and Thermodynamics.

Temperature, on absolute scale, (°K)	T
on other scales	$\theta \ldots t$
Thermal conductivity	k
Energy (general symbol)	E
Work done by or on a system	$w \ldots W$
Heat entering a system	q
Specific heat	c_p and c_v
molecular heat	C_p and C
Ratio of specific heats	γ
Latent heat, per g.	l
per mol	L
Intrinsic energy	$U \ldots E$
Enthalpy, total heat, or heat content	H
Entropy	S
Free energy (Helmholtz)	$A \ldots F$
Thermodynamic potential, Gibbs function, free energy (G. N. Lewis)	G

Vapour pressure constant	i
Chemical potential	μ
Activity	a
coefficient (for molar concentration)	f
Osmotic coefficient	g
Van 't Hoff's factor	i

Electricity.

Quantity of electricity	Q
especially electrostatic charge	e
Potential (difference)	V
Volta potential	V
electrokinetic potential	ζ
especially electromotive force of voltaic cells	E
Potential gradient, in electric field	X
Electronic exit work function	ϕ
Current	I
Resistance	R
specific resistance	ρ . . . r
specific conductance	κ . . . σ
Inductance, self	L
mutual	M
Electrostatic capacity	C
Dielectric constant	ϵ
Dipole moment	μ

Electrochemistry.

Degree of electrolytic dissociation	α
Valency of an ion	z
Ionic strength	I
Equivalent conductance	Λ
equivalent ionic conductance, "mobility"	l (with subscript)
Transport number	T (with subscript) . . . n (with subscript)
Single electrode potential	e (with subscript), E (with subscript)
Electrolytic polarisation, overvoltage	η . . . π

Magnetism.

Magnetic field strength	H
flux	ϕ
permeability	μ
susceptibility—volume	κ
mass	χ
moment	M
induction	B

Optics.

Wave length	λ
Wave number	ν
Intensity of light	I
Refractive index	n (with subscript) . . . μ (with subscript)
specific refraction	r (with subscript)
molecular refraction	$[R]$ (with subscript)
Molar extinction coefficient	ϵ
Angle of (optical) rotation	α
specific rotation	$[\alpha]$
Specific magnetic rotation	ω

3. To be Printed in Roman, when not Greek.

(a) *Examples of Mathematical Constants and Operators.*

Base of natural logarithms	e
Ratio of circumference to diameter	π
Differential	d
partial	∂
Increment	Δ
very small increment	δ
Sum	Σ
Product	Π
Function	f, ϕ

(b) *Examples of single-letter abbreviations.*

*Ampère (in sub-units)	a.
Volt	v.
Ohm	Ω.
Watt	w.
Farad	f.
Henry	h.
Centigrade	c.
Fahrenheit	f.
Kelvin	k.
Ångstrom unit	a.
micron	μ.
metre	m.
gram	g.
litre	l.
Röntgen unit	r.
†Normal (concentration)	n.
†Molar (concentration)	m.

* *E.g.* " ma." for " milliampère "; but " amp." is preferred for " ampère."

† Separated by a hyphen (and no full stop) from a chemical formula which follows it.

The following prefixes to abbreviations for the names of units should be used to indicate the specified multiples or sub-multiples of these units:

M	mega-	$10^{6}\times$
k	kilo-	$10^{3}\times$
d	deci-	$10^{-1}\times$
c	centi-	$10^{-2}\times$
m	milli-	$10^{-3}\times$
μ	micro-	$10^{-6}\times$

e.g., MΩ. denotes megohm; kw., kilowatt; and μg., microgram. The use of μμ. instead of mμ. to denote 10^{-7} cm., or of γ to denote microgram is deprecated.

4. Subscripts and other Modifying Signs.

(a) *Subscripts to symbols for quantities.*

I, II . . .	*especially with symbols for thermodynamic functions*, referring to different systems or different states of a system.
1, 2 . . .	
A B . .	referring to molecular species A, B, etc.
i	referring to a typical ionic species i.
u	referring to an undissociated molecule.
+, −	referring to a positive or negative ion, or to a positive or negative electrode.
p, *v*, *T*	indicating constant pressure, volume, and temperature respectively.
q	indicating adiabatic conditions.
w	indicating that no work is performed.
p, *c*, *a*	*with symbol for an equilibrium constant*, indicating that it is expressed in terms of pressure, concentration, or activity.
G, V, L, X	referring to gas, vapour, liquid, and crystalline states, respectively.
f, *e*, *s*, *t*, *d*	referring to fusion, evaporation (vaporisation of liquid), sublimation, transition, and dissolution or dilution respectively.
c	referring to the critical state or indicating a critical value.
0	referring to a standard state, or indicating limiting value at infinite dilution.
D, D, F	*with symbols for optical properties*, referring to a particular wavelength.

Where a subscript has to be added to a symbol which already carries a subscript, the two subscripts may be separated by a comma or the symbol with the first subscript may be enclosed in parentheses with the second subscript outside.

(b) *Other modifying signs.*

°	*as right-hand superscript to symbol (particularly to a symbol for a general thermodynamic function—see p. 5)*, referring to a standard state.
[ ]	*enclosing formula of chemical substance*, indicating its molar concentration.
{ }	*enclosing formula of chemical substance*, indicating its molar activity.

In crystallography it is recommended that:

Millerian indices be enclosed in parentheses, ( );
Laue indices be unenclosed;
Indices of a plane family be enclosed in braces, { };
Indices of a zone axis or line be enclosed in brackets, [ ].

Numerals attached to a symbol for a chemical element in various positions have the following meanings:

upper left mass number of atom.
lower left nuclear charge of atom.
lower right number of atoms in molecule.

e.g., ${}^{7}_{3}\mathrm{Li}$; ${}^{2}_{1}\mathrm{H}_{2}$ (= D_{2}).

ALPHABETICAL INDEX OF RECOMMENDED SYMBOLS, and single-letter abbreviations.

including all those given in the above lists except prefixes, subscripts and other modifying signs.

The name of any quantity for which a given symbol is a second preference is printed in parentheses.

A free energy—Helmholtz; atomic weight; surface area.
A. Ångstrom unit.
a activity; (acceleration).
a. ampère, in sub-units—see footnote, p. 2093.
B magnetic induction.
C concentration; electrostatic capacity.
with subscript: molecular heat capacity.
c. Centigrade.
c velocity of light in vacuo.
c velocity; concentration.
with subscript: specific heat.
D diffusion coefficient.
d diameter; distance; (density).
d differential.
∂ partial differential.
E energy; (intrinsic energy); potential difference, especially electromotive force of voltaic cells.
with subscript: single electrode potential.
e electronic charge—charge equal and opposite in sign to that of an electron.
e quantity of electricity, especially electrostatic charge.
with subscript: single electrode potential.
e base of natural logarithms.
F Faraday's constant.
F force; (free energy—Helmholtz).
F. farad; Fahrenheit.
acceleration; activity coefficient, for molar concentration; partition function.

f function.
G thermodynamic potential, Gibbs function, free energy—G. N. Lewis.
g acceleration due to gravity, standard value.
g acceleration due to gravity, as a variable; osmotic coefficient.
g. gram.
H enthalpy, total heat, heat content; magnetic field strength.
H. henry.
h Planck's constant.
h height.
I moment of inertia; ionic strength; electric current; intensity of light.
i vapour pressure constant; van 't Hoff's factor.
J mechanical equivalent of heat.
J gram-equivalent weight.
K chemical equilibrium constant; (compressibility).
K, solubility product.
K. Kelvin.
k Boltzmann's constant.
k thermal conductivity; velocity constant of chemical reaction.
L latent heat per mol; self inductance; (solubility product).
l latent heat per g.; length; mean free path of molecules.
with subscript: equivalent ionic conductance, "mobility".
l. litre.
M molecular weight; mutual inductance; magnetic moment.
M. molar concentration.
m rest mass of an electron.
m mass.
m. metre.
N Avogadro's number.
N mol fraction.
N. normal concentration.
n number of mols.
with subscript: (transport number).
with subscript: refractive index.
P pressure.
[*P*] parachor.
p pressure.
Q quantity of electricity.
q heat entering a system.
R gas constant per mol; Rydberg's constant.
R electrical resistance.
[*R*] *with subscript:* molecular refraction.
r radius; (specific resistance).
with subscript: specific refraction.
r. Röntgen unit.
S entropy.
s solubility; (surface area).
T temperature, on absolute Kelvin scale.
with subscript: transport number.
t time; (temperature—not on absolute scale).

U intrinsic energy.
u velocity component.
with subscript: velocity of ions.
V volume; potential, potential difference, including Volta potential.
v. volt.
v volume; velocity; velocity component.
W (work done by or on a system).
w. watt.
w work done by or on a system; velocity component.
X force component; potential gradient in electric field.
x mol fraction.
Y force component.
Z force component; g.-equivalent weight; number of molecular collisions per second; atomic number.
z valency of an ion.

α degree of electrolytic dissociation; angle of optical rotation.
$[\alpha]$ specific optical rotation.
Γ surface concentration excess.
γ ratio of specific heats; surface tension.
Δ increment.
δ very small increment.
ϵ dielectric constant; molar extinction coefficient.
ζ electrokinetic potential.
η efficiency of any process; viscosity; electrolytic polarisation, overvoltage.
θ angle of contact; temperature—not on absolute scale.
κ compressibility; specific conductance; magnetic susceptibility—volume.
Λ equivalent conductance.
λ wave length.
μ chemical potential; dipole moment; magnetic permeability.
with subscript: (refractive index).
μ. micron.
ν frequency; wave number.
Π pressure, especially osmotic pressure.
Π product.
π (electrolytic polarisation, overvoltage).
π ratio of circumference to diameter.
ρ density; specific resistance.
Σ sum.
σ diameter of molecules; (surface tension); (specific conductance).
τ time interval, especially half or mean life.
ϕ fluidity; electronic exit work function; magnetic flux.
Φ function.
χ magnetic susceptibility—mass.
ψ wave function.
Ω. ohm.
ω angular velocity; specific magnetic rotation.

ADDITIONS TO THE LIBRARY OF THE CHEMICAL SOCIETY DURING THE YEAR 1940.

ALLEN, ROBERT. *See* IMPERIAL INSTITUTE. *Mineral Resources Department.*

AMERICAN CHEMICAL SOCIETY. *See* NATIONAL FIRE PROTECTION ASSOCIATION.

AMERICAN GAS ASSOCIATION. Fuel flue gases: the application and interpretation of gas analyses and tests. New York 1940. pp. x + 198. ill.

AMERICAN MEDICAL ASSOCIATION. The vitamins: a symposium. Chicago 1939. pp. 637. ill.

ASOCIACION QUIMICA ARGENTINA. Industria y Quimica. Vol. I, etc. Buenos Aires 1935 +. (*Reference.*)

ASSOCIATION OF AMERICAN SOAP AND GLYCERINE PRODUCERS. Glycerine and its derivatives. 2nd edition. Chicago 1940. pp. 28. ill.

ASSOCIATION OF OFFICIAL AGRICULTURAL CHEMISTS. Official and tentative methods of analysis. 5th edition. Washington 1940. pp. xii + 757. ill.

BAKER & Co. Bibliography of patents on palladium as a catalyst. Part i. United States and German patents. Newark, N.J. [1939]. pp. 24.

—— Platinum metals and the chemical industry. Newark, N.J. 1939. pp. 14. ill.

BALL, JOHN. *See* EGYPT. *Survey and Mines Department.*

BAMFORD, FRANK. Poisons: their isolation and identification. London 1940. pp. viii + 344. ill.

BELL, [SIR WILLIAM JAMES]. Sale of food and drugs. 10th edition. By R. A. ROBINSON and ROBERT IVES. London 1939. pp. xxviii + 363 + 42.

BENNETT, E. F. A review of driers and drying. London 1940. pp. 90. ill.

BODANSKY, MEYER, and BODANSKY, OSCAR. Biochemistry of disease. New York 1940. pp. xii + 684. ill.

BODANSKY, OSCAR. *See* BODANSKY, MEYER.

BORAX CONSOLIDATED, LTD. Ceramic glazes. By FELIX SINGER. London [1940]. pp. 95.

BRADDICK, H. J. J. Cosmic rays and mesotrons. Cambridge 1939. pp. x + 68. ill.

BRANDT, KARL. Whale oil: an economic analysis. Stanford University 1940. pp. xii + 264. ill.

BRITISH PLASTICS YEAR BOOK, 1940. London 1940. pp. 462. ill. (*Reference.*)

BRITISH STANDARDS INSTITUTION. British Standard Specifications. No. 593—1940. General purpose laboratory thermometers. (Revised.) pp. 16.

—— —— No. 611—1940. Petri dishes. (Revised.) pp. 7. ill.

—— —— No. 866—Part II—1940. Schedule of sizes of tins and cans for commodities other than food products for British packers in the United Kingdom for the home trade. pp. 15. ill.

—— —— No. 894—1940. The determination of the flow and drop points of fats and allied substances. (Apparatus and method of use.) pp. 11. ill.

—— —— No. 895—1940. Microbiological examination of butter. pp. 14.

—— —— No. 902—1940. Methods of testing latex, raw rubber, and unvulcanised compounded rubber. pp. 29. ill.

—— —— No. 903—1940. Methods of testing vulcanised rubber. pp. 74. ill.

—— —— No. 909—1940. Vitamins A and D in oil for animal feeding purposes. pp. 15.

—— —— No. 910—1940. Controlled cod-liver oil mixture for animal feeding purposes. pp. 15.

—— —— No. 911—1940. Method for the biological assay of vitamin D_3 by the Chick method. pp. 20.

—— —— No. 914—1940. Tests for laboratory porcelain. pp. 7. ill.

—— —— Nos. 925–926—1940. Oils, thinners, driers, and extenders. pp. 30.

—— —— Nos. 927–928—1940. Pigments: white, black, and coloured. pp. 23.

—— —— No. 929—1940. Ready mixed paints, priming paint, undercoating paints, finishing coat paints—oil glass. pp. 15. ill.

BRUN, E., and JOCKEY, E. Cours de chimie générale à l'usage des élèves de mathématiques spéciales. Paris 1940. pp. vi + 243. ill.

BULANKIN, I. N. Principles of senescence of gelatine sols and jellies. Materials on senescence of biocolloids. Kharkov 1939. pp. 103. ill. [In Russian.]

BURKE, A. D. Practical manufacture of cultured milks and kindred products. Milwaukee 1938. pp. xvi + 195. ill.

BURTON, DONALD, and ROBERTSHAW, GEORGE F. Sulphated oils and allied products: their chemistry and analysis. London 1939. pp. vi + 163 + iv. ill.

BURTON, E. F., SMITH, H. GRAYSON, and WILHELM, J. O. Phenomena at the temperature of liquid helium. (American Chemical Society, Monograph Series.) New York 1940. pp. xii + 362. ill.

BUTLER, J. A. V. Electrocapillarity: the chemistry and physics of electrodes and other charged surfaces. London 1940. pp. x + 208. ill.

CARTIERE BURGO. The experimental laboratory of the Cartiere Burgo. Torino 1939. pp. 16 + 35 plates. (*Reference.*)

CHALMERS, BRUCE. The physical examination of metals. Vol. I. Optical methods. London 1939. pp. viii + 181. ill.

CHAMBERS's Technical Dictionary. Edited by C. F. TWENEY and L. E. C. HUGHES. London 1940. pp. viii + 957. (*Reference.*)

CHARLEY, V. L. S. *See* IMPERIAL BUREAU OF HORTICULTURE AND PLANTATION CROPS.

COMPAGNO, I. Analisi dei metalli non ferrosi di uso industriale e della loro leghe. Milano 1939. pp. xii + 494.

CONCANNON, C. C. *See* UNITED STATES. *Department of Commerce.* Trade promotion series. No. 195.

CONTI, PIERO GINORI. Il laboratorio ricerche di Larderello. Firenze 1938. pp. 42. ill.

CONWAY, EDWARD J. Micro-diffusion analysis and volumetric error. London 1939. pp. xiv + 306. ill.

COOPER, H. R. *See* INDIAN TEA ASSOCIATION. *Tocklai Experimental Station.* Memorandum No. 6.

DAVIES, GEORGE M. *See* EVANS, JOHN W.

DEPARTMENT OF SCIENTIFIC AND INDUSTRIAL RESEARCH. The industrial application of *X*-ray crystal analysis. Facilities provided by the National Physical Laboratory. London 1934. pp. 14. ill.

—— Methods for the detection of toxic gases in industry. Leaflet No. 7. Carbon monoxide. London 1939. pp. iv + 9. ill.

—— —— Leaflet No. 12. Organic halogen compounds. pp. 6.

—— *Fuel Research.* Physical and chemical survey of the national coal resources, No. 44. Methods of analysis of coal and coke. pp. vi + 85. ill.

DIEHL, HARVEY. The applications of the dioximes to analytical chemistry. Columbus 1940. pp. 62.

DORSEY, N. ERNEST. Properties of ordinary water-substance in all its phases: water-vapor, water, and all the ices. (American Chemical Society, Monograph Series.) New York 1940. pp. xxiv + 673. ill.

DUPAIN, GEORGE ZEPHIRIN. Elementary dietetics. Sydney 1940. pp. 128. ill.

EGYPT. *Survey and Mines Department.* Contributions to the geography of Egypt. [With chemical and physical data.] By JOHN BALL. Cairo 1939. pp. xvi + 308. ill. (*Reference.*)

ELLIS, CARLETON. Printing inks: their chemistry and technology. New York 1940. pp. 560. ill.

ELWELL, WILLIAM E. [Compiler.] Pectin: its manufacture, properties and uses. [Seattle] 1939. pp. 66.

EVANS, JOHN W., and DAVIES, GEORGE M. Elementary crystallography. 2nd edition. London 1940. pp. viii + 149. ill.

FEARON, WILLIAM ROBERT. An introduction to biochemistry. 2nd edition. London 1940. pp. xii + 475. ill.

FEIGL, FRITZ. Specific and special reactions for use in qualitative analysis, with special reference to spot test analysis. Translated from a revision of the 3rd German edition by RALPH E. OESPER. New York 1940. pp. x + 192.

FIELDING, T. J. Photo-electric and selenium cells: their operation, construction and uses. 2nd edition. London 1940. pp. viii + 163. ill.

FINDLAY, ALEXANDER. Chemistry in the service of man. 5th edition. London 1939. pp. xx + 398. ill.

FOWLER, R. H., and GUGGENHEIM, E. A. Statistical thermodynamics. Cambridge 1939. pp. x + 693. ill.

FRANCIS, WILFRID. Boiler house and power station chemistry. London 1940. pp. xii + 203. ill.

GODDEN, WILLIAM. *See* IMPERIAL BUREAU OF ANIMAL NUTRITION. Technical Communication No. 9.

GREAVES, RICHARD HENRY, and WRIGHTON, HAROLD. Practical microscopical metallography. 3rd edition. London 1939. pp. xii + 272. ill.

GRINDLEY, J. *See* MINISTRY OF AGRICULTURE AND FISHERIES. Fishery Investigations.

GUGGENHEIM, E. A. *See* FOWLER, R. H.

GUGGENHEIM, K. *See* KOVACS, A. S.

GURNEY, R. W. *See* MOTT, N. F.

HAMMETT, LOUIS P. Physical organic chemistry: reaction rates, equilibria, and mechanisms. New York 1940. pp. x + 404. ill.

HARD, ALEXANDER. The story of rayon. London 1939. pp. viii + 83.

HARRISON, T. H. J. *See* IMPERIAL BUREAU OF HORTICULTURE AND PLANTATION CROPS.

HARRY, RALPH G. Modern cosmeticology : the principles and practice of modern cosmetics. New York 1940. pp. xiv + 288. ill.

HEATON, NOEL. Outlines of paint technology. 2nd edition. London 1940. pp. x + 413. ill.

HENRIQUES, ROBERT. Der Kautschuk und seine Quellen. Dresden 1899. pp. 31 + 5 tables and 4 maps.

HENRY, VICTOR M. *See* TURNER, WAYNE I.

HERZBERG, GERHARD. Molecular spectra and molecular structure. I. Diatomic molecules. Translated . . . by J. W. T. SPINKS. New York 1939. pp. xxx + 592. ill.

HILDEBRAND, BENGT. *See* KUNGL. SVENSKA VETENSKAPSAKADEMIEN.

HILDITCH, T. P. The chemical constitution of natural fats. London 1940. pp. xiii + 438.

HOLMAN, H. J. *See* IMPERIAL INSTITUTE. *Plant and Animal Products Department.*

HOLMSIDE & SOUTH MOOR COLLIERIES and SETTLINGSTONES MINES. Witherite (natural barium carbonate) and its industrial uses. Newcastle-upon-Tyne 1940. pp. 56. ill.

HOMERBERG, VICTOR O. *See* WILLIAMS, ROBERT S.

HOUWINK, R. [Editor.] Chemie und Technologie der Kunststoffe. Leipzig 1939. pp. xvi + 625. ill.

HOWLING, G. E. *See* IMPERIAL INSTITUTE. *Mineral Resources Department.*

HUDSON, J. C. The corrosion of iron and steel : being a general account of the work of the Corrosion Committee of the Iron and Steel Institute and the British Iron and Steel Federation. London 1940. pp. xvi + 319. ill.

HUGHES, L. E. C. *See* CHAMBERS's Technical Dictionary.

I. G. FARBENINDUSTRIE AKTIENGESELLSCHAFT. *Medico-Chemical Research Laboratories.* Medicine in its chemical aspects. Vol. III. Leverkusen 1938. pp. 416. ill.

IMPERIAL BUREAU OF ANIMAL NUTRITION. Technical Communication No. 9. Methods for the chemical analysis of biological material in nutrition investigations. Edited by WILLIAM GODDEN. Aberdeen 1937. pp. 55. ill.

—— Technical Communication No. 10. Table of composition of foods, giving the energy value, protein, fat, carbohydrate, calcium, phosphorus and iron content of some 300 foods commonly used in Great Britain and compiled for use in the analysis of dietary surveys. Aberdeen 1938. pp. 14.

IMPERIAL BUREAU OF HORTICULTURE AND PLANTATION CROPS. Technical Communication No. 11. Fruit juices and related products. By V. L. S. CHARLEY and T. H. J. HARRISON. East Malling 1939. pp. 104. ill.

IMPERIAL INSTITUTE. *Mineral Resources Department.* Reports on the mineral industry of the British Empire and foreign countries. Chrome ore and chromium. By ROBERT ALLEN and G. E. HOWLING. London 1940. pp. 118. (*Reference.*)

—— *Plant and Animal Products Department.* A survey of insecticide materials of vegetable origin. Edited by H. J. HOLMAN. London 1940. pp. vi + 155.

INDIAN TEA ASSOCIATION. *Tocklai Experimental Station.* Memorandum No. 6. Nitrogen supply to tea. By H. R. COOPER. Calcutta 1939. pp. iv + 135.

INDUSTRIA Y QUIMICA. *See* ASOCIACION QUIMICA ARGENTINA.

INSTITUTE OF CHEMISTRY OF GREAT BRITAIN AND IRELAND. Lecture on a century of chemistry : " From Boyle to Priestley." Compiled by RICHARD B. PILCHER. London 1940. pp. 43. ill.

—— Lecture on " The mechanism of enzyme action." By J. H. QUASTEL. London 1940. pp. 27.

INSTITUTE OF PUBLIC CLEANSING. The agricultural value of screened dust. By WILLIAM B. STRAIN. [Glasgow] 1939. pp. 21. ill.

IVES, ROBERT. *See* BELL, SIR WILLIAM JAMES.

JAMES, G. V. Water treatment . . . for all purposes and effluents purification. London 1940. pp. xii + 224. ill.

JEANS, SIR JAMES. An introduction to the kinetic theory of gases. Cambridge 1940. pp. viii + 311. ill.

JENNY, A. The anodic oxidation of aluminium and its alloys. Translated by WINIFRED LEWIS. London 1940. pp. viii + 231. ill.

JOCKEY, E. *See* BRUN, E.

JORPES, J. ERIK. Heparin, its chemistry, physiology and application in medicine. London 1939. pp. xii + 87. ill.

JOSLYN, MAYNARD A. *See* TRESSLER, DONALD K.

KAZAN STATE UNIVERSITY. Uchenie Zapiski. Vol. 98, etc. Chemistry. Kazan 1938 +. (*Reference.*) [In Russian.]

KEANE, C. A. *See* LUNGE, GEORGE.

KEHL, GEORGE L. The principles of metallographic laboratory practice. New York 1939. pp. xii + 359. ill.

KENDALL, JAMES. Young chemists and great discoveries. London 1939. pp. xvi + 272. ill.

KINGZETT, C. T. Chemical encyclopædia : a digest of chemistry and its industrial applications. 6th edition. Revised and edited by RALPH K. STRONG. London 1940. pp. x + 1088. ill. (*Reference.*)

KIPPING, F. BARRY. *See* PERKIN, W. H., jun.

KIPPING, F. STANLEY. *See* PERKIN, W. H., jun.

KLIGLER, I. J. *See* KOVACS, A. S.

KOVACS, A. S., GUGGENHEIM, K., and KLIGLER, I. J. The composition of vegetables, fruits and milk produced in Palestine. Jerusalem 1939. pp. 62.

KUNGL. SVENSKA VETENSKAPSAKADEMIEN. Förhistoria, grundläggning och första organisation. By BENGT HILDEBRAND. 2 vols. Stockholm 1939. pp. xvi + 672, vi, 673 to 885. ill. (*Reference.*)

LACEY, WILLIAM N. *See* SAGE, BRUCE H.

LEWIS, WINIFRED. *See* JENNY, A.

LUNGE, GEORGE, and KEANE, C. A. Technical methods of chemical analysis. 2nd edition. Edited by C. A. KEANE and P. C. L. THORNE. Vol. IV. London 1940. pp. xvi + 963. ill. (*Reference.*)

LYNCH, G. ROCHE, and PRYCE, D. M. Toxicology. I. Homicidal, suicidal, and accidental poisoning. (From the *British Encyclopaedia of Medical Practice*, 1939, 12.) pp. [68]. (*Reference.*)

MA, TSU SHENG. Studies on synthetic drugs. (i) Partial reduction of some alkyl quaternary salts of pyridine and quinoline carbonamides. (ii) Studies toward the synthesis of 4-methyl-5, 5- dialkyluracil. Chicago 1940. pp. 31.

MCCANCE, R. A. *See* MEDICAL RESEARCH COUNCIL. *Special Report Series*, No. 235.

MCDONAGH, J. E. R. The Universe through medicine. London 1940. pp. vi + 389. ill.

MACDOUGALL, F. H. Thermodynamics and chemistry. 3rd edition. New York 1939. pp. x + 491. ill.

MACK, JULIAN ELLIS, and MARTIN, MILES J. The photographic process. New York 1939. pp. xviii + 586. ill.

MCLESTER, JAMES S. Nutrition and diet in health and disease. 3rd edition. Philadelphia 1939. pp. 838. ill.

MANN, FREDERICK GEORGE, and SAUNDERS, BERNARD CHARLES. Practical organic chemistry. 2nd edition. London 1938. pp. xiv + 418. ill.

—— —— Introduction to practical organic chemistry. London 1939. pp. x + 191. ill.

MANTELL, C. L. Industrial electrochemistry. 2nd edition. New York 1940. pp. x + 656. ill.

MARSH, GEORGE L. *See* TRESSLER, DONALD K.

MARTIN, HUBERT. The scientific principles of plant protection with special reference to chemical control. 3rd edition. London 1940. pp. x + 385.

MARTIN, MILES J. *See* MACK, JULIAN ELLIS.

MATHEWS, ALBERT P. Physiological chemistry. 6th edition. [Baltimore] 1939. pp. xvi + 1488. ill.

MEDICAL RESEARCH COUNCIL. *Special Report Series*, No. 235. The chemical composition of foods. By R. A. MCCANCE and E. M. WIDDOWSON. London 1940. pp. 150. (*Reference.*)

MERCK & Co. The Merck index. 5th edition. Rahway, N.J. 1940. pp. viii + 1060. (*Reference.*)

MIALL, STEPHEN. [Editor.] A new dictionary of chemistry. London 1940. pp. xvi + 575. ill. (*Reference.*)

MILLIKAN, R. A. Cosmic rays: three lectures. Cambridge 1939. pp. viii + 134. ill.

MINISTRY OF AGRICULTURE AND FISHERIES. Fishery Investigations. Series 1, Vol. IV, No. 2. Chemical methods for the study of river pollution. By C. H. ROBERTS, J. GRINDLEY and E. H. WILLIAMS. London 1940. pp. 36. ill.

MOELWYN-HUGHES, E. A. Physical chemistry: an introduction. Cambridge 1940. pp. viii + 660. ill.

MOTT, N. F., and GURNEY, R. W. Electronic processes in ionic crystals. Oxford 1940. pp. xii + 275. ill.

MOTT, R. A., and WHEELER, R. V. The quality of coke: being the 2nd report of the Midland Coke Research Committee, Iron and Steel Industrial Research Council. London 1939. pp. xxxvi + 464. ill.

NATIONAL FIRE PROTECTION ASSOCIATION and AMERICAN CHEMICAL SOCIETY. *Committee on Hazardous Chemicals and Explosives.* A table of common hazardous chemicals. 4th edition. Boston, Mass. 1940. pp. 23.

NATIONAL SMOKE ABATEMENT SOCIETY. 7th Annual Report, 1936–37, etc. London 1937 +. (*Reference.*)

NEWITT, DUDLEY M. The design of high pressure plant and the properties of fluids at high pressures. Oxford 1940. pp. viii + 491. ill.

OESPER, RALPH E. *See* FEIGL, FRITZ.

OIL AND COLOUR CHEMISTS' ASSOCIATION. Varnish making: papers read at a symposium. London 1939. pp. x + 225. ill.

OSBORN, T. W. B. *See* RADLOFF, ELLEN M.

PAULING, LINUS. The nature of the chemical bond and the structure of molecules and crystals. 2nd edition. Ithaca 1940. pp. xvi + 450. ill.

PEDERSON, KAI O. *See* SVEDBERG, THE.

PERKIN, [W. H., jun.], and KIPPING, F. STANLEY. Organic chemistry. Revised edition. Part III. By F. S. KIPPING and F.

BARRY KIPPING. London 1939. pp. viii, 615 to 1029.

PILCHER, RICHARD B. *See* INSTITUTE OF CHEMISTRY OF GREAT BRITAIN AND IRELAND.

PRIESTLEY, JOSEPH. The history and present state of discoveries relating to vision, light, and colours. 2 vols. London 1772. pp. xiv, xvi + 422, ii, 423 to 812, xii. ill. (*Reference.*)

PRYCE, D. M. *See* LYNCH, G. ROCHE.

QUASTEL, J. H. *See* INSTITUTE OF CHEMISTRY OF GREAT BRITAIN AND IRELAND.

RADLEY, J. A. Starch and its derivatives. London 1940. pp. x + 346. ill.

RADLOFF, ELLEN M., and OSBORN, T. W. B. Malnutrition in South Africa. Johannesburg 1939. pp. 34.

REKO, VICTOR A. Magische Gifte. Rausch- und Betäubungsmittel der neuen Welt. 2nd edition. Stuttgart 1938. pp. xii + 206.

REVUE SCIENTIFIQUE. Revue rose illustrée. Year LXXVIII etc. Paris 1940 +. (*Reference.*)

RICE, OSCAR KNEFLER. Electronic structure and chemical binding, with special reference to inorganic chemistry. New York 1940. pp. xiv + 511. ill.

RICHTERS, C. E. Die Tiere im chemischen Kriege. 4th edition. Berlin 1939. pp. 280.

ROBERTS, C. H. *See* MINISTRY OF AGRICULTURE AND FISHERIES. Fishery Investigations.

ROBERTS, J. K. Some problems in adsorption. Cambridge 1939. pp. x + 120. ill.

ROBERTSHAW, GEORGE F. *See* BURTON, DONALD.

ROBINSON, R. A. *See* BELL, SIR WILLIAM JAMES.

ROTHAMSTED EXPERIMENTAL STATION. Library catalogue of printed books and pamphlets on agriculture published between 1471 and 1840. 2nd edition. Harpenden 1940. pp. 293. ill. (*Reference.*)

RUSSELL, SIR E. J. A student's book of soils and manures. 3rd edition. Cambridge 1940. pp. viii + 296. ill.

SAGE, BRUCE H., and LACEY, WILLIAM N. Volumetric and phase behaviour of hydrocarbons. Stanford University 1939. pp. xii + 299. ill.

SAND, H. J. S. Electrochemistry and electrochemical analysis. Vol. II. Gravimetric electrolytic analysis and electrolytic Marsh tests. London 1940. pp. x + 149. ill.

SAUNDERS, BERNARD CHARLES. *See* MANN, FREDERICK GEORGE.

SEARLE, ALFRED B. Refractory materials: their manufacture and uses. 3rd edition. London 1940. pp. xvi + 895. ill.

SETTLINGSTONES MINES. *See* HOLMSIDE & SOUTH MOOR COLLIERIES.

SHEPARD, HAROLD H. The chemistry and toxicology of insecticides. Minneapolis 1939. pp. iii + 383. ill.

SHOHL, ALFRED T. Mineral metabolism. (American Chemical Society, Monograph Series.) New York 1939. pp. x + 384. ill.

SIMONDS, HERBERT R. Industrial plastics. London 1940. pp. xii + 371. ill.

SINGER, FELIX. *See* BORAX CONSOLIDATED, LTD.

SKINKLE, JOHN H. Textile testing: physical, chemical, and microscopical. [New York] 1940. pp. xii + 272. ill.

SLATER, J. C. Introduction to chemical physics. New York 1939. pp. xiv + 521. ill.

SMITH, H. GRAYSON. *See* BURTON, E. F.

SMITH, T. B. Analytical processes: a physico-chemical interpretation. 2nd edition. London 1940. pp. viii + 470. ill.

SNELL, CORNELIA T. *See* SNELL, FOSTER DEE.

SNELL, FOSTER DEE, and SNELL, CORNELIA T. Chemicals of commerce. New York 1939. pp. viii + 542. (*Reference.*)

SOCIETY OF CHEMICAL INDUSTRY. Vitamin E. A symposium held under the auspices of the Food Group (Nutrition Panel). London 1939. pp. viii + 88.

SPINKS, J. W. T. *See* HERZBERG, GERHARD.

STAUDINGER, HERMANN. Über die makromolekulare Chemie. Freiburg 1939. pp. 32.

STERN, H. J. Practical latex work. Leicester 1940. pp. 103. ill.

STRAIN, WILLIAM B. *See* INSTITUTE OF PUBLIC CLEANSING.

STRONG, RALPH K. *See* KINGZETT, C. T.

SVEDBERG, THE, and PEDERSEN, KAI O. The ultracentrifuge. Oxford 1940. pp. x + 478. ill.

SWIFT, A. H. *See* UNITED STATES. *Department of Commerce.* Trade promotion series. No. 195.

SZENT-GYÖRGYI, ALBERT V. On oxidation, fermentation, vitamins, health and disease. Baltimore 1939. pp xii + 109.

THAYER-OJEDA, TOMÁS. Hipotesis sobre la formacion de la materia. Santiago 1939. pp. 56.

THORNE, P. C. L. *See* LUNGE, GEORGE.

THORPE, [SIR EDWARD]. Dictionary of applied chemistry. 4th edition. Vol. IV. By SIR JOCELYN THORPE and M. A. WHITELEY. London 1940. pp. xxiv + 603. ill. (*Reference.*)

THORPE, SIR JOCELYN. *See* THORPE, SIR EDWARD.

TRESSLER, DONALD K., JOSLYN, MAYNARD A., and MARSH, GEORGE L. Fruit and vegetable juices. New York 1939. pp. xiv + 518. ill.

TN5/29-2

TURNER, WAYNE I., and HENRY, VICTOR M. Growing plants in nutrient solutions, or scientifically controlled growth. New York 1939. pp. xiv + 154. ill.

TWENEY, C. F. *See* CHAMBERS's Technical Dictionary.

UNITED STATES. *Department of Commerce*. Trade promotion series. No. 195. World chemical developments in 1938. By C. C. CONCANNON and A. H. SWIFT. Washington 1939. pp. viii + 205. (*Reference.*)

—— *Department of Labor*. Industrial Health Series. No. 14. The causes and prevention of nitrous fumes poisoning. Washington 1939. pp. 5.

—— —— —— No. 15. The causes and prevention of metal fume fever. Washington 1939. pp. 4.

—— —— —— No. 16. The causes and prevention of ammonia poisoning. Washington 1939. pp. 4.

—— —— —— No. 17. The causes and prevention of manganese poisoning. Washington 1939. pp. 4.

VOLMER, MAX. Kinetik der Phasenbildung. Dresden 1939. pp. xii + 220. ill.

WALLERSTEINER, K. The aldehydes in the chemotherapy of tumours. (From the *London Hospital Gazette*, 1940, 43.)

WALTER, F. G. The manufacture of compressed yeast. London 1940. pp. viii + 254. ill.

WHEELER, R. V. *See* MOTT, R. A.

WHITE, ALFRED H. Engineering materials. New York 1939. pp. x + 547. ill.

WHITELEY, M. A. *See* THORPE, SIR EDWARD.

WIDDOWSON, E. M. *See* MEDICAL RESEARCH COUNCIL. *Special Report Series*, No. 235.

WIGGIN, HENRY, & Co. Inconel: an account of its properties, typical uses and fabrication. London [1940]. pp. 23. ill.

WIGNER, J. H. Soap manufacture: the chemical processes. London 1940. pp. viii + 162.

WILHELM, J. O. *See* BURTON, E. F.

WILLIAMS, E. H. *See* MINISTRY OF AGRICULTURE AND FISHERIES. Fishery Investigations.

WILLIAMS, ROBERT S., and HOMERBERG, VICTOR O. Principles of metallography. 4th edition. New York 1939. pp. x + 339. ill.

WILMINK, GERARD FREDERIK. Inwerking van cyclohexylamine op aromatische halogeennitroverbindingen. Leiden 1940. pp. vi + 167.

WRIGHTON, HAROLD. *See* GREAVES, RICHARD HENRY.